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# SEEDS 



ESTABLISHED 1802 .
J. M.THORBURN \& CO.. 33 BARCLAY ST., - . 38 PARK PLACE,
NEW YORK CITY.

These assortments contain only the choicest sorts，and are sure to give satisfaction．They are prepared in advance in order to facilitate our work，on which account a considerable reduction from the catalogue prices is made．The reduced price will not be allowed unless the assortment is taken in full and without change．

## No．1．PRICE，\＄2．50；BY MAT OR EXPRESS，\＄2．75

```
pt. Beans, Refugee Green-Pod.
    Golden Wax.
I pa. Beet, Egyptian.
        Globe.
    Cabbage, Early Wakefield.
    Cabbage, Early Wakefield.
    Cabbage, Early Wakefield.
    Cauliflower, Thor. Gilt-Edge.
    Celery, White Plume.
pt. Corn, Early Bantam.
```


## I＂W Wator，Black Spanish

pt．Corn，Cory．
Stowell＇s Evergreen．
I pa．Cucumber，Imp．White Spine．
Eggplant，Imp．N．Y．Purple．
Kohirabi，Early White Vienna．
Leek，Best Flag．
Lettuce，Big Boston．
Cos，or Romaine．
Melon，Lung Island Beauty，

I pa．Orion，White Globe． Large Red Globe．
I＂Parsley，Extra Curled．
I pt．Peas，Thor．Ex．－E＇y Market．
Wrinkled，Our Select＇n．
I oz．Radish，Scarlet Turnip．
I＂Spinach，Viroflay．
I pa．Tomato，Stone．
r oz．Turnip，Snowball．

## No．2．PRICE，\＄5；BY MAIL OR EXPRESS，$\$ 5.50$

I pt．Beans，Refugee Green－Pod． Early Valentine． Golden Wax．
Stringless Green－Pod． Challenger Lima．
Beet，Egyptian．
Globe．
pa．Cabbage，Early Wakefield． Ball－Head．
Red，for pickling．
I oz．Carrot，Half－Long．
I pa．Cauliflower，Thor，Gilt－Edge．
Thor．Snowbail．
Celery，White Plume．
Fin de Siecle．
pt．Corn，Early Bantam．
Country Gentleman．
Stowell＇s Evergreen．

I oz．Cress，or Pepper Grass． Cucumber，Imp．White Spine． Eggplant，New York Purple． Kohlrabi，Early White Vienna Leek，Best Flag．
Lettuce，Big Boston． May King． Cos，or Romaine． Giant Crystal Head．
Melon，Netted Gem． Long Island Beauty． Water，Sugar Stick． Black Spanish．
Okra，Perkins＇Improved．
Onion，White Globe． Large Red Globe． Parsley，Extra Curled．
oz．Parsnip，Hollow Crown．
I pt．Peas，Thor，Ex－E＇y Market．
I ${ }^{\prime}$ each Peas，Two Best Wrinkled．
Our Selection．
I pa．Pepper，Chinese Giant．
I oz．Radish，White－tipped．
＂．Scarlet Turnip．
Salsify，Thor．Imp．Thick－r＇t＇d．
Spinach，Viroflay．
Squash，E＇y Bush Cr＇kneck．
＂Hubbard． Boston Marrow．
Tomato，Early June Pink
$\begin{array}{ll}\text { I＂} & \text {＂Stone．} \\ \text { I oz．Turnip，Snowball．}\end{array}$ Yellow Globe．

## No．3．PRICE， 10 ；RY MAIL OR EXPRESS，$\$ 11$

I qt．Beans，Refugee Green－Pod．
I pt．＂Early Valentine．
Golden Wax．
＂Stringless Green－Pod．
＂Old Homestead．
＂Challenger Lima．
Beet，Egyptian．
Globe．
Half－Long．
Brussels Sprouts，Half Dw＇f．
Cabbage，Early Wakefield．
Savoy．
Thorburn Private Stock．
Red，for pickling．
Carrot，Early French Forcing．
Half－Long．
Cauliflower，Thor．Gilt－Edge．
Thor．Snowball．
pa．
Celery，Fin de Siecle．
White Plume．
pa．＂Golden Self－blanching
qt．Corn，Early Bantam． Cory．

## No．4．PRICE，

$2 \mathrm{qt}$. Beans，Refugee Green－Pod． Early Valentine．
Golden Wax．
Stringless Green－Pod．
Old Homestead．
Challenger Lima．
Beet，Egyptian．
Globe．
Half－Long．
Brussels Sprouts，Half Dwarf． Cabbage，Early Wakefield．

Savoy．
Thorburn Private Stock Flat Dutch．
Red，for pickling．
Carrot，Early French Forcing． Half－Long．
Caulifower，Thorburn Gilt－ Edge．
Thor．Snowball．
I pa．
oz．
Celery，Fin de Siecle．
White Plume．
Golden Self－blanching
2 qts．Corn，Early Bantam．
COPYRIGHT 1913 BY J．A．THOREURN \＆CO

I qt．Corn，Country Gentleman．
Stowell＇s Evergreen．
Corn Salad，Large－seeded．
Cress，or Pepper Grass．
Cucumber，Imp．White Spine．
Eggplant，Imp．N．Y．Purple．
Endive，Green Curied．
Broad－leaved．
Kohlrabi，Early White Vienna
Leek，Best Flag．
Lettuce，Big Boston． May King． Cos，or Romaine． Giant Crystal Head．
Melon，Long Island Beauty． Netted Gem． Water，Sugar Stick．
Okra，Perkins＇Improved．
Onion，Yellow Danvers． Large Red Globe． White Globe．
Parsley，Extra Curled．

2 ozs．Parsnip，Hollow Crown．
I qt．Peas，Thor．Ex－E＇y Market．
I pt．each Peas，Four Best Wrinkled， Our Selection．
pa．Pepper，Chinese Giant．
2 oz ．Radish，White－tipped．
Scarlet Turnip．
Early White Turnip．
Scarlet Globe．
Chinese Winter．
Salsify，Thor．Imp．Thick－r＇t＇d．
Spinach，Viroflay．
Squash，E＇y Bush Cr＇kneck． Hubbard．
Boston Marrow．
Tomato，Early June Pink． Stone．
Beauty．
Royal Red．
Turnip，Thor．Fam．Rutabaga． Snowball：
Yellow Globe．
pa．each Herbs，Five Varieties．

## \＄18；置至 MA置（18

## EXPRESS，\＄20

qts．Corn，Cory．
Country Gentleman．
Stowell＇s Evergreen．
3 ＇
Corn Salad, Large-seeded.

Cress，or Pepper Grass．
Cucumber，Imp．White Spine
Eggplant，Imp．N．Y．Purple．
Endive，Green Curled．
Broad－leaved．
Kohlrabí，Early White Vienna
Leek，Best Flag．
Lettuce，Big Boston．
May King．
Cos，or Romaine．
Giant Crystal Head．

## Melon，Netted Gem．

Long Island Beauty．
Water，Sugar Stick．
（＂）＂，Black Spanish
Okra，Perkins＇Iraproved．
Onion，Yellow Danvers．
White Globe．
Large Red Globe．
Parsley，Extra Curled．
ozs．Parsnip，Hollow Crown．
I qt．Peas，Thor．Ex．－E＇y Market．
7 qts．Peas，Four Best Wrinkled， Our Selection．
Pepper，Chinese Giant． Sweet Salad．
Radish，White－tipped． Scarlet Turnip．
Early White Turnip．
Scarlet Globe．
Chinese Winter．
Salsify，Thor．Imp．Thick－r＇t＇d．
Spinach，Viroflay．
Squash，E＇y Bush Cr＇kneck． Hubbard．
Boston Marrow．
Tomato，Early June Pink．
Stone．
Beauty．
pa．＂$\quad$ Beauty．
Royal Red．
ozs．Turaip，Snowball．
Turaip，Snowball．
＂＂${ }^{\text {＂}}$＂．Thor．Fam．Rutabaga．
pa．each Herbs，Five Varieties．

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## THORBURN AFRICAN ORANGE DAISY HYBRIDS

WE will mail you a package of the seed of these very unusual and beautiful African Daisy Hybrids for 15 cents. We have had this picture exquisitely reproduced in the natural colors of the flowers, and a copy will be mailed you if you request it at the time of ordering the seeds.

The picture we will send you is a reproduction from a water-color made expressly for us by a celebrated German artist, and bears no relation to the usual seed catalogue picture in colors.

## J. M. THORBURN \& CO.

> A house that, during the one hundred and eleven years it has been in business, has clung firmly to its original idea of supplying seeds of the highest grade only, gaining thereby the confidence and loyal friendship of a steadily increasing number of planters.

THIS is our in 2 th successive Annual Catalogue. It contains lists of the very choice seeds, bulbs, roots (and some other things) that we have to offer for 1913. You can make up your order from its pages with entire confidence in the exceptional quality of the products we are offering.

Over a century in business means something-and it does much to emphasize the reliability of our goods. The Thorburn experience-the Thorburn knowledge of what's what in seeds-the Thorburn reputation for fair dealing-these are your safeguards in buying.

We would suggest that, if convenient, you make up your orders as soon after the receipt of this catalogue as possible. It will help us to ship promptly and it will help you by giving you your goods when you want them. Placing your orders late sometimes makes delays unavoidable. But we have the facilities for handling a vast amount of business and your orders will receive our best attention, regardless of when they come.

If you don't just know what to order, tell us the size of your garden or how much you want to spend-we will do the rest; we will cheerfully select suitable seeds for you and even go so far as sending you a plan for your garden.

If there is any information you want that is not given in this catalogue, write us about it. We will give your inquiries our prompt and careful attention.

May we have the pleasure of filling your orders?

## CULTURAL DIRECTIONS

These apply to the climate of New York and vicinity. For more northern and southern localities the necessary changes in time of sowing, etc., will readily suggest themselves to gardeners.

## ORDERS

Orders should be written on our order sheet or on a blank sheet separate from letter, preferably in ink, and, to receive prompt attention, should be directed to the firm, and not to individuals. Orders from new customers should be accompanied by a remittance in the form of a Post Office or Express Money Order, Bank Check or Bank Bills.

## PRICES

The prices quoted are net, and do NOT include free transit, EXCEPT FOR SEEDS IN PACKETS, OUNCES or QUARTERPOUNDS, on which WE pay postage or expressage anywhere in the U . S .

## SEEDS BY MAIL OR EXPRESS

Eight cents per pound should be added if wanted by mail or prepaid express in the United States, and 16 cents per pound in Canada, except for seeds ordered by the packet, ounce or $1 / 4 \mathrm{lb}$., which we mail free. By special arrangement with the express companies we can ship seeds and bulbs at a reduction of 20 per cent from the regular rates. Unless otherwise instructed, we send orders from parties unknown to us C. O. D.

It sometimes happens that certain articles are not ready when the bulk of the goods ordered is shipped. In such cases, rather than hold back the whole order, we send what is ready and keep a memorandum of what is to follow when available. Customers would, therefore, in such cases, do well to await our advice or invoices before writing in regard to items not sent them.

## NAME, ADDRESS, ETC.

We beg our correspondents to give us on each order the correct name and address; also to indicate very precisely the means of carriage which they prefer, mail, express or freight, and the office or railroad station which best serves their locality. In case these directions are not followed out, or if they are not sufficient, we shall ourselves choose the most advantageous and convenient means, but entirely at the risk of the customer.

## WARRANTIES

Seeds of best quality will often fail through improper treatment. Thus, a small seed may be sown so deeply that the young plant cannot reach the surface. More failures result from disregard of the conditions necessary to germination than from inferiority of the seeds used.

These conditions are: a proper temperature, sufficient moisture, and free access of air. Besides these, the soil must be in proper condition, and present no physical obstacle to the growth of the young plant. If heavy rains have compacted the surface of the soil, and the sun has baked it to a hard crust, it will be impossible, even if all other conditions are favorable, for the seedling plants to force their way through it, and many perish from this cause alone.

Seeds differ greatly as to the temperature required for germination. Beets, Cress, Peas, etc., germinate rapidly at a temperature of $45^{\circ}$; but if Melons and other seeds of that family, Bush or Pole Beans, and other plants of subtropical origin, are sown under the same conditions, they will be apt to decay, as for their prompt germination they require a heat of at least $60^{\circ}$. For this reason many seeds fail yearly from too early sowing.

The second condition, proper moisture, is likely to be violated by an excess rather than by too small a portion. The proper amount is that which a well-drained soil will naturally hold.

Free access of air is all-important, and this is interfered with by an excess of water in the soil.

In germination complex chemical changes take place in the seeds, in which the air
performs an important part. A portion of the seed is consumed, carbonic acid gas being given off in changing the starch and other constituents of the seed into nutriment to forward the growth of the germ or embryo plant, which depends upon the contents of the seed until it forms roots below ground and leaves above, and is able to sustain itself.

Besides these conditions affecting the germination of the seed, the young plants, after they have made their way to the surface, are liable to various accidents; a sudden current of very cold air, or a continuous drying wind may check their growth or destroy them altogether.

In addition, there are numerous insects, both below and above ground, that may attack the plants, some of them being so

## F. W. BRUGGERHOF, President

E. E. BRUGGERHOF, Vice-President and Treasurer A. PROTIN, Asst. Treasurer
small that they often destroy a crop before they are discovered.

We may also mention the well-known tendency of many vegetables to revert to their original types, notwithstanding the care of the seed-grower, the yellow-podded wax Beans becoming green, the yellow and white Celery becoming more or less green, dwarf Peas becoming running sorts, etc.
J. M. Thorburn \& Co. give no warranty, express or implied, as to description, quality, productiveness or any other matter of any seeds, bulbs or plants they send out; and they will not be in any way responsible for the crop. If the purchaser does not accept the goods on these terms, they are at once to be returned.

## J. M. THORBURN \& CO.

33 Barclay Street, New York

## A FEW PLEASANT WORDS FROM ONE OF OUR CUSTOMERS

Mr. Lewis, whose letter we print below, is gardener and superintendent of a large estate near New York City, and a particularly wide experience makes his opinion a valuable one.

Messrs. J. M. Thorburn \& Co.
Dear sirs:-It is with pleasure that I write to inform you of the success I had this spring, summer and fall with vegetable seeds that were bought from you. I shall mention a few:

New York Improved Eggplant was a decided success. Parsnips all one pound and over-all solid. Carrots, Summer and Fall, large yield, very fine. Early Nordheim Sweet Corn was exceptionally fine. Cauliflower very good despite lack of proper protection against rabbits. Lima Beans fine, and a very good yield up to frost. Onions finest $I$ ever raised. Crawford Half-Dwarf Celery the best I have raised in forty years.

In fact all seeds I planted of yours gave complete satisfaction. I have grown seeds from practically every large concern in the country, and I can honestly say that yours have always given me satisfaction.

It is with pleasure I write you this, and trust I shall be able to give you a larger order in the spring. I remain

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6 J. M. THORBURN & CO., 33 BARCLAY ST., NEW YORK
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PORTION OF OUR TRIAL-GROUNDS

## Directions for the Cultivation of Vegetables

TO SECURE a good crop of vegetables, three things at least are necessary, viz., a suitable soil, pure seed and clean culture. The exposure for a vegetable-garden should be south or southeast, or nearly so. The soil should be naturally rich and friable, a sandy loam being about the best. If the soil be stiff, it should be gradually mellowed by the free use of barnyard manure, or, if convenient, by the addition of sand. If wet, or inclined to hold an excess of moisture, it should be underdrained, preferably by tile; but, if possible, a location should be selected naturally dry and free from surface water.

A dark-colored soil, or one supplied with a goodly portion of decayed vegetable matter, will produce the earliest crops. If the soil be shallow, it should be deepened gradually by plowing or spading an inch or two deeper each year, and not all at once by trenching or subsoiling, unless manure and money both be abundant. A sandy soil may be greatly improved by adding vegetable mold from the woods.

To produce the best results, the vegetablegarden should have at least one foot of good, rich soil. The roots of large trees should not be allowed to encroach on any part of the garden, though large trees, especially evergreens, sufficiently far off, afford a valuable protection on the north and west.

Mark the garden off into squares or beds of convenient size, to facilitate the practice of a rotation of crops, which is an important matter. As a rule, never let the same crop or kind of vegetable occupy the same bed or spot two years in succession. Potatoes, Onions, and a few other things, may form exceptions to this rule. Every year the beds must be warmed up by a liberal coat of manure, which should be thoroughly mixed with the soil. From seed sown in drills, larger crops from a given surface are grown, and cultivation is simple and comparatively easy. The space between the drills, and other special information, is given in the body of the Catalogue; the least distance is named, in order to economize space; it might be increased in some cases to advantage. The ground
should be frequently hoed, to kill the weeds and to keep the soil mellow; and the proper time to hoe is just when the weeds appear above the ground.

Much time may be gained by starting certain kinds of plants in a hotbed, or even in a coldframe, the latter being a convenient thing, even on a small place. The hotbed is chiefly intended for raising early Tomatoes, Eggplants, Peppers, Cabbage, Cauliflower, Lettuce, etc., but as all these plants can now be bought cheaply of the seedsmen at the proper time, the expense and labor of a hotbed may be dispensed with, especially on small places.

To prepare a coldframe.-The coldframe is simply a frame set on the ground, no bottom heat being applied. It is banked up on the outside during the winter with salt hay, straw or coarse litter. The soil is prepared by forking in and thoroughly mixing to the depth of 10 to 12 inches a liberal quantity of old, well-rotted manure. The manure of an old hotbed is good for the purpose. The frame is prepared in the fall, and young Cabbage, Cauliflower and Lettuce plants are set out in it in time to
get well established before very cold weather. Cauliflower and Cabbage should be set down to the first leaf, and the soil made firm around the plants. The seed is usually sown, in the vicinity of New York, from the i5th to the 20th of September, but the very early kinds some 8 or io days later. The young plants will be ready to transplant in about 25 to 30 days. During the cold nights and stormy days, the beds should be closely covered with the sashes, and these further protected by straw mats or shutters. Cauliflower needs more and closer protection than Cabbage, as it is rather more tender. During mild days admit air freely, the object being to keep the plants in a dormant state, without actual freezing, so that when spring comes they are in a forward state for setting out early crops. Seeds of Cabbage, Cauliflower, Lettuce and Radish may be sown in a coldframe in the spring from the last week in February to the first week in March. The frame should stand in a warm and sheltered spot, and be kept from freezing by mats or a thick covering of straw during cold nights.

## Directions for Making a Hotbed

IN THE vicinity of New York, from the first to the latter part of March is quite early enough to make a hotbed. The time must vary according to the latitude. Use fresh horse-manure, and add to this, if possible, one-third to one-half of its bulk of leaves. Mix them thoroughly, tramping down the mass in successive layers, and form into a large pile, so that fermentation will proceed.

In two or three days fermentation will be apparent by the escape of steam from the heap. Now turn again, and allow the heap to remain until the second fermentation commences. Make a pit $21 / 2$ feet deep, and of a size suited to the number of plants required. The pit will be better if built up of brick. It should be located in a dry, sheltered spot, facing the south or east, if possible. Hotbed sashes are usually $3 \times 6$ feet, and one or two sashes will give early plants enough for a small family. The frame of the bed should be 18 inches high at the back and 12 inches in front, which will give the proper slope to catch the sunlight. Crosspieces should be placed for the sashes to slide on, to facilitate opening and shutting the frames.

When every thing is ready, the manure
is placed in the pit and trodden down firmly in layers to the required depth, 2 to $21 / 2$ feet. Then put on the sashes, and keep the pit closed until the heat arises. At first it will probably be $100^{\circ}$ or more, which is too hot to sow the seed in; but in two or three days it will subside to $90^{\circ}$ or a little less, when the soil may be put on to the depth of 6 to 8 inches. Try the heat by plunging a thermometer into the manure.

The soil should be of well-rotted sod (or common garden soil will do), mixed with about a third of fine old manure; and in this the seeds may be sown thinly in drills 2 to 3 inches apart and afterward (as soon as out of the seed-leaf) either thinned out or else transplanted to another frame. Air must be given every mild day by raising the sashes at the back.

Water with tepid water whenever necessary, and during cold nights and snowstorms keep covered with mats or board shutters. Tomatoes, Peppers and Eggplants should be sown in a separate frame from Cabbage, Cauliflower and Lettuce, as they require more heat.

Hotbeds may be made on the surface of the ground, if the manure extends a foot wider on all sides than the frame.

# Novelties and Specialties in Vegetable Seeds 

Bean, French Kidney, Dwarf Princess White Dutch


#### Abstract

Not by any means a new sort but a variety of great value notwithstanding. As an abundant cropper it is unsurpassed and the tenderness of its pods is hardly equaled by any other variety. The pods may be allowed to remain on the vines even until quite old without impairing their tenderness in the least or affecting their tastefulness when cooked. Furthermore there is no tendency toward rust, for this sort is not easily affected by wet weather and it can stand more cold than almost any other kind. It is valuable also as a shell bean. Pt. 20 cts., qt. 30 cts ., $1 / 2 \mathrm{pk}$. $\$ \mathrm{I}$, pk. $\$ \mathrm{I} .75$.


## Beet, Thorburn's Early Yellow Turnip

This variety though not new we consider deserving of a place in our list of Novelties and Specialties. It is very early and its deep orange-yellow flesh is of remarkably fine texture and lusciously sweet and tender.

It is most desirable for family use and should be better known. It is not a Mangel-Wurzel. Pkt. 5 cts., oz. I 5 cts., $1 / 4 \mathrm{lb}$. 40 cts ., lb. \$I. 50 .

## Brussels Sprouts, "Hercules"

This fine, new sort is tolerably early, of dwarf habit (scarcely $11 / 2$ feet high), of robust and sturdy growth and with large, round, solid sprouts, beginning close to the ground. Desirable. Pkt. Io cts., oz. 40 cts.

## New Early Cabbage, Copenhagen Market Genuine danish-

Undoubtedly the finest, large, round-headed early Cabbage. The heads average about ten pounds each in weight, are very solid, and of fine quality. It matures as early as Charleston Wakefield, and will give a heavier yield per acre than that well-known variety. The plant is short-stemmed, the leaves light green,


THORBURN'S GILT-EDGE GOLDEN SEL.FBLANCHING CELERY rather small, and always tightly folded. The plants, therefore, can be set closer together than is usual with varieties of similar size. Pkt. I5 cts., oz. 60 cts ., $1 / 4 \mathrm{lb}$. $\$ 2, \mathrm{lb}$. $\$ 7$.

## Jersey Wakefield Cabbage <br> THORBURN'S SELECTED STOCK

Undoubtedly the finest strain of this most popular, wellknown early variety in cultivation. The heads are extremely solid, pyramidal in shape, with very little outside foliage. Pkt. io cts., oz. 30 cts., $1 / 4 \mathrm{lb}$. 85 cts ., lb. $\$ 3$.

## Enkhuizen Glory Cabbage

Large early sort, white and very solid. Produces fine, ballshaped heads and combines large size with earliness as no other early Cabbage does. A fine market sort. One of the best. Pkt. Io cts., oz. 30 cts ., $1 / 4 \mathrm{lb} .85 \mathrm{cts} ., \mathrm{lb} . \$ 3$.

## Thorburn's Gilt Edge Cauliflower

Best and surest of all. Produces large, heavy, solid, white heads of finest quality. Undoubtedly the best variety. Pkt. 25 cts., oz. $\$ 2.25,1 / 4 \mathrm{lb}$. \$7.50.

## Celery, Thorburn's Gilt Edge Golden <br> Self-Blanching

Golden Self-blanching is the variety of Celery par excellence and our strain we can recommend with every confidence. The chief characteristics of this sort are its self-blanching qualities and the beautiful waxy yellow appearance of the stalks. It is of compact, heavy growth and produces stalks that are brittle and crisp in the extreme and hearts that are large and solid. Pkt. I5 cts., oz. 85 cts ., $1 / 4 \mathrm{lb} . \$ 3.25$, lb. $\$ \mathrm{I} 2$.

## Thorburn's Noroton Selected White Spine Cucumber

A selection of the Improved White Spine, but earlier, more perfect in shape and more prolific. The best slicing variety we have seen, being solid in flesh, fine-grained, tender and of delicious flavor. Vigorous, healthy grower. A splendid sort for the home-garden and absolutely without an equal for market. Pkt. Io cts., oz. 25 cts., $1 / 4 \mathrm{lb}$. 65 cts., lb. $\$ 2$.

## Extra-Early Nordheim Sweet Corn

The earliest Sweet Corn in cultivation. Produces stalks from 6 to 7 feet high, each bearing three to four nearly perfect ears of finest quality. On style of Minnesota but far exceeding that variety in the deliciousness of its flavor, as well as in earliness and productiveness. Pt. 30c., qt. 50c., $1 / 2 \mathrm{pk} . \$ \mathrm{r} .50, \mathrm{pk} . \$ 2.50$.

## Thorburn's Black Beauty Eggplant

Our strain of this handsome, early, purplish black, large-fruited variety is unexcelled. The fruits are of remarkably fine quality, produced continuously and developing more quickly than those of other large sorts. Pkt io cts., oz. 40 cts.

## Thorburn's Big Boston Lettuce

Our strain of this well-known and most popular sort is without doubt the finest in existence. It is too well known to require any lengthy description. It is sufficient to say that it is equally valuable for growing in greenhouses for winter use, in frames for spring or for sowing the seed in the open ground for use in summer and fall. It is unequaled by any other variety for crispness and tenderness, produces large, solid heads with few outside leaves and stands long before running to seed. See illustration of a field of Big Boston Lettuce on page 32. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb}$. 50 cts ., 1 b . $\$ \mathrm{I} .50$.

## Universal Lettuce $\begin{gathered}\text { For Forcing or for } \\ \text { Open Ground }\end{gathered}$

Thus far, forcing varieties of Lettuce have been valuable for forcing only and not for open ground. This sort, therefore, has a twofold value in that it can be used both for forcing and for outdoor planting. "Universal" is, as a forcing kind, most excellent; it grows very fast and is ten days earlier than any other sort, besides producing large, solid heads, a quality which is found only in sorts that are cultivated in the open ground. It is at the same time tender and crisp. In the open ground it grows to an enormous size, is very beautiful in appearance, and the heads are perfectly solid. It is hardier than most sorts, and can therefore be planted out very early. It stands the heat of summer admirably and is slow to run to seed. Pkt. 20 cts.

## Golden Yellow Cos Lettuce

Produces bright golden yellow leaves and large, solid hearts, crisp and tender and of excellent flavor. It stands a long time before running to seed. Pkt. 5 cts., oz. 20 cts ., $1 / 4 \mathrm{lb} .60 \mathrm{cts}$.

## Red Cos Lettuce

A very attractive variety; productive and unusually slow in running to seed. The head of the fullgrown plant is tall and entirely green with the exception of a brown-red tinge on top. The outer leaves are long, rounded at the ends and deeply colored red-brown. It usuaily heads well without tying. Pkt. 5 cts., oz. 20 cts ., $1 / 4 \mathrm{lb} .50 \mathrm{cts}$.

## Hybrid Casaba Muskmelon $\begin{gathered}\text { One of the Finest Sorts } \\ \text { in Cultivation }\end{gathered}$

A vigorous grower and an enormous yielder. It produces melons of large size, averaging 8 to 10 inches in diameter, and of unsurpassed flavor. The skin is green until the fruits begin to ripen, when it turns to a light yellow. The flesh is white, rich and luscious and from 2 to 3 inches thick. Pkt. Io cts., oz. 25 cts., $1 / 4 \mathrm{lb}$. 75 cts .

## Tom Watson Watermelon

Produces melons 16 to 22 inches long and 8 to 10 inches in diameter. The dark green rind is thin but tough, so that it stands shipping well. The flesh is deep red, crisp and melting and of finest flavor. Pkt. 5 cts., oz. 10 cts., $1 / 4 \mathrm{lb}$. 25 cts ., lb. 75 cts.

## Thorburn's Vaugirard Winter Onion

A French variety of inestimable value and much esteemed. It is quite hardy and can stand more frost than any other sort. The bulbs are silvery white, inclined toward flatness, much on the style of Early Paris, its parent. It produces Onions of fine size but short tops and little foliage. Pkt. Io cts., oz. 35 cts ., $11 / \mathrm{lb}$. \$ $\mathrm{I}, \mathrm{lb} . \$ 3$.

## Denia Onion. genuine imported

We are again able to offer a small quantity of seed of this valuable Onion which was offered by us in 191I, for the first time in America.

It is generally conceded that this is the parent type of the well-known Prizetaker, of which, however, it is a far superior strain. It runs more uniform in size and is a more characteristic globe. The bulb is more compact and its rings or layers of growth are thinner. Generally the neck is smaller than Prizetaker, and it seems to ripen down somewhat earlier. Pkt. I5 cts., oz. 75 cts.

## New Early Dwarf Pea, "Peter Pan"

"Peter Pan," introduced in I9II, has proved itself to be, without doubt, the finest and earliest dwarf wrinkled Pea yet introduced. It is a tremendous cropper, producing long, dark green pods filled with Peas of exquisite flavor. The plants (covered with pods) are robust in habit, and it is surely becoming a favorite dwarf early Pea. Height $11 / 2$ feet. Pkt. of 1 gill, 25 cts.

## Thorburn's Ruby Giant Pepper

A comparatively new variety-a cross between Ruby King and Chinese Giant. It grows quite large and is of a desirable shape for stuffing. It is of a mild and delicate flavor. Pkt. io cts., oz. 40 cts.

## Thorburn's Upright Sweet Salad Pepper

Of recent introduction. Handsome, productive, and of finest quality. The color is bright scarlet and the flesh thick, mild and very sweet. The Peppers are as large as Ruby King and are all borne upright, clear of the ground. The flesh is so thick and the skin so tender that it may be fried like a beefsteak, and so sweet that it may be eaten like an apple. Pkt. Io cts., oz. 35 cts ., $1 / 4 \mathrm{lb}$. $\$ \mathrm{I}$, lb. $\$ 3$.

## Thorburn's Chinese Giant Pepper

This is probably the largest of all sweet Peppers, and as a stuffing variety it leaves little to be desired. The flesh is very thick and remarkably mild and sweet. Pkt. Io cts., oz. 40 cts., $11 / 1 \mathrm{lb} . \$ \mathrm{I} .25, \mathrm{lb} . \$ 4$.

## Thorburn's Deep Scarlet Forcing Turnip-Shaped Radish

Produces Radishes of a nice medium size, very tender and crisp and of a rich, deep scarlet color. Very excellent forcing sort. Pkt. 5 cts., oz. io cts., $1 \frac{1}{4} 1 \mathrm{~b} .25 \mathrm{cts} ., \mathrm{lb} .75 \mathrm{cts}$.

## Thorburn's Scarlet Globe-Shaped Radish

This variety is fine for forcing or for the open ground. The Radishes are almost round, of a beautiful, rich scarlet, very tender and crisp. Pkt. 5 cts., oz. 10 cts., $1 / 4 \mathrm{lb}$. 20 cts ., lb .65 cts.

## Thorburn's Crimson Giant, or Giant Butter Radish

Desirable for forcing or for outdoor planting. Will produce Radishes nearly twice the size of other red forcing varieties and, in spite of their large size, will retain their crispness and solidity. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. 25 cts., lb. 75 cts.

## Red Rock Tomato

An exceedingly firm-fleshed variety producing large-sized fruits that ripen evenly without cracking. In color and other general characteristics it closely resembles the well-known Stone on which it is an improvement. Pkt. 5 cts., oz. 25 cts., $1 / 4 \mathrm{lb}$. 75 cts., lb. $\$ 2.50$.

## Thorburn's Improved Terra-Cotta Tomato

An improvement on this very valuable sort introduced by us a number of years ago. It is quite distinct as to color, the pronounced terra-cotta being carried through almost to the very heart of the fruit. It is of delightfully tender flesh with almost no core and nearly free from acidity, and produces mediumsized Tomatoes, solid and firm, particularly desirable for slicing. A very handsome sort. Pkt. 15 cts., oz. 60 cts.

## Montesson Hardy White Winter Turnip

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# Flower Seed Novelties and Specialties of Merit 

 Specialties of Merit}


ELEGANCE ASTER

## Elegance Aster ${ }_{(h A)}$

## In Splendid Mixture

The first really beautiful single Aster. The growth is vigorous and the habit quite pyramidal. The flowers have very long, elegantly waved petals, and a very small yellow center only, each borne on a long, firm stem. It is astonishingly floriferous, and is extremely valuable either for bedding or for cut-flowers. The flowers last in water one to two weeks. Pkt. I5 cts.

## New Double Camellia-Flowered Giant Begonia (hha)

## Tuberous-rooted

The most striking and remarkable of all doubleflowering Begonias. The plants are strong, luxuriant growers, producing their flowers most abundantly on erect stems, qualities which render it a first-class bedder. Sowings of Camellia-flowered Begonias produce 95 per cent double-flowering plants, nearly all of which come true to type. The very double flowers, measuring 4 to 5 inches across, vary in color from vivid rose to scarlet. Though generally edged, some of them are beautifully mottled. They are of such perfect Camelliashape that they may almost be taken for Camellias. Pkt. 30 cts .

## Calceolaria hybrida, "Golden Glory" ( $h h P$ )

As a greenhouse plant this new variety is invaluable, and the English introducer describes it as a hardy herbaceous perennial, claiming the plants to have withstood over 20 degrees of frost. It continues long in bloom and its glorious color makes it a striking acquisition. Pkt. 30 cts., 2 for 50 cts.

## Calliopsis radiata,"Tiger Star"

(hA)
A rich and continuously blooming annual with peculiarly colored dark brown and golden yellow tigered flowers, the petals of which are curiously twisted like the Cactus Dahlia. Of easy culture, growing in ordinary garden soil and producing its strikingly colored flowers in great abundance all summer. Grows 8 inches high and forms round, compact bushes. Pkt. 15 cts .

## Carnation, English Feathered Pink, Double Perfection ( $h h P$ )

A new superb race of Feathered Pinks producing enormous perfectly double flowers, clear white in the center of the petal, but bordered deep crimson.
Splendid for borders or for cut-flowers. Comes true from seed. Pkt. of 20 seeds, 25 cts.

## Vienna Carnation, Dwarf EarlyFlowering, "Brilliant Violet"

This new Carnation is of the same type as the Improved Early Dwarf Vienna Carnation. Like that class it is quite dwarf and compact growing, and very early flowering. The color of this introduction is brilliant violet, a new and distinct shade rarely seen in any mixture. Most striking and very lovely. Pkt. 25 cts.

calliopsis radiata, "tiger star'

## Celosia, Ostrich Plume, Pride of Castle Gould ( $h$ A)

(Celosia pyramidalis plumosa hybrida, Castle Gould)
Of upright, compact growth, 2 to 3 feet high, with large, fine, feathered heads in many variations of shades and self-colors. Among the more distinct colors will be found Blood-Red, Carmine, Deep Scarlet, Yellow, Orange, etc. Valuable either as a pot-plant or for bedding for sunny situations. Pkt. 25 cts., 2 for 45 cts.

## Cyclamen persicum

 giganteum, "Lemania" (gBu)The Lemania Cyclamen should certainly rank among the most interesting and remarkable novelties of the year, and is not to be compared with any other Cyclamen so far in existence. Upon sturdy stems, it produces erect, upward-growing, flat flowers, similar to those of the Anemone or Narcissus. (See illustration.) The petals, most of which are slightly waved and fringed, lend the flowers a pretty and elegant appearance. The color of the flowers is partly pure white, partly white with eye, but clear red and many other tints may also be found. Comes 70 to 80 per cent true from seed. Pkt. 50 cts .

## Delphinium Belladonna (hP)



CYCLAMEN PERSICUM GIGANTEUM, "LEMANIA"

Beautiful sky-blue flowers; handsome plants, blooming freely. Comes very true from seed. Pkt. 15 cts.


DIANTHUS LACINIATUS PUNCTATUS New "Dark-Shaded Princess Pinks"

## Dianthus Heddewigii marginatus (hA)

## Single Japan Pink, "Silveredged"

This most striking novelty forms fairly dwarf and com-pact-growing bushes, and flowers very richly and freely, bearing its medium-sized blossoms quite regularly above the foliage, and forming a pretty bouquet of fascinating appearance. The flowers are slightly fringed, dark bloodred with a purple hue, and have a uniform white edge. Highly recommended. Pkt. 20 cts .

## Dianthus Heddewigii nobilis, "Royal

## Pinks" (hA)

This new class produces plants noble in appearance and flowers 3 to 4 inches in diameter. The petals are frilled and fringed, giving the large flowers a graceful and airy appearance. The colors are a deep, glowing blood-red, shading to carmine and pink and even white. The foliage is grayish blue, sometimes darker. The plant grows vigorously and tall, and gives lots of first-class flowers on long stalks, lasting a whole week in water. The more the blooms are cut the more the plant will produce. Pkt. I5c.

## Dianthus laciniatus punctatus,"DarkShaded Princess Pink" (hA)

This novelty generally displays dark and quite peculiar colors, such as purplish violet, blood-red, dark salmon, etc. Many of the flowers show most effective markings, either by star designs or by light-colored, almost white, edgings. A decided acquisition. Pkt. 15 cts.

## Dimorphotheca aurantiaca hybrida ( $h A$ )

## New, Selected Hybrids in Splendid Mixture (Transvaal Daisy)

In habit, growth and foliage, as well as in the height of the plant ( 12 to 15 inches) and the size of the flowers ( $21 / 2$ to $23 / 4$ inches across), these new hybrids are like the parent Dimorphotheca aurantiaca. They vary in color from the purest white to reddish and bluish white tints; sulphur-, lemon- and bright golden yellow; light orange and reddish yellow changing to pale salmon-rose, and from tender salmon to deep salmonorange. Also varieties with different-colored zones, such as white with a broad sulphur-yellow zone, and soft salmon with a deep salmon-red inner circle. Very easily raised from seed. Pkt. I5 cts., 2 for 25 cts.


DIMORPHOTHECA AURANTIACA HYBRIDA

## Dimorphotheca sinuata ( $h A$ )

Of as easy culture as Aurantiaca, this new South African species distinguishes itself by the singularly pretty color of its flowers. They show a uniform, clear, satiny buff or light chamois with a bluish disc, when fully open in sunshine; the reverse of the petals is purplish red. This rare coloring is distinct and new. The plants grow I2 to I5 inches high, and form regularly branched bushes, densely covered with flowers $2 \frac{1}{2}$ to $23 / 4$ inches in diameter, with light green foliage. Pkt. 25 cts .

## Eschscholtzia Thorburni <br> (hA)

The grandest of all Eschscholtzias and an improvement on our own original stock. In habit it is the same as the California Poppy, but it is decidedly distinct in its coloring. The unopened buds are of the richest possible crimson, toning down in the inner side of the flower, when fully matured, to bright flame-color and molten gold. The flowers are larger than those of other Eschscholtzias and are borne with equal profusion. Pkt. Io cts., $1 / 40 \mathrm{zz} .40 \mathrm{cts}$.

## Gaillardia Lorenziana, "The <br> $$
\text { Bride" }(h \bar{A})
$$

A comparatively new, exquisite variety, producing perfectly double, creamy white flowers of great beauty and substance, borne on long stems, making it an ideal plant either for bedding or for cutting. Pkt. 25 cts.

## Gypsophila muralis alba ( $h A$ )

This new variety differs from the rose-colored type in that it produces snow-white flowers. It is a pretty dwarf annual, thickly studded with tiny pure white flowers during the whole season. Extremely useful for edging and for rockwork. Pkt. 20 cts.

## Gypsophila paniculata flore pleno ( $h P$ )

By repeated artificial crossing of the double-flowering variety and the single-flowering type, seeds of this handsome perennial have been obtained which produce about 50 per cent of double-flowering plants. The flowers are of the purest white and are indispensable for bouquets and vases. Pkt. 25 cts., 2 for 40 cts.

## Linaria macedonica speciosa ( $h P$ ) Toadflax

Strikingly handsome, hardy perennial Toadflax, a native of the Orient, blooming freely the first year when sown early. Grows $21 / 2$ to 3 feet in height, forming very robust and vigorous-growing plants, garnished with glaucous-green foliage and producing their tall flower-spikes in the greatest abundance. The individual flowers, borne in dense racemes, are an inch across and nearly 2 inches long, including the spur, and present a clear citron-yellow color with large orange-yellow spot on the lower lip. As the flowers last a long time in bloom, they are highly recommended for cutting. Pkt. 20 cts., 2 for 35 cts.

## Myosotis alpestris elegantissima coerulea flore pleno

## Double Blue Forget-me-not

A new double-flowered variety of the blue pyramidal Alpine Forget-me-not, coming nearly true from seed. Height of the plant 8 to 9 inches. The double flowers preserve their freshness for a long time. Pkt. 25 cts ., 2 for 45 cts .

## Moonflower, New Early-Blooming, "Sky-Blue" <br> Impomœa grandiflora rubro-cœerulea. Early-Flowering

This entirely new strain produces gorgeous flowers, 4 to 5 inches across, in great abundance. The color is a lovely sky-blue with rose-colored markings. It grows very fast, from 15 to 18 feet in height, and will be found most valuable for trellises, walls, arbors, etc. Sown in February or March in boxes or in hotbeds, the young plants may be set out in April or May in a sunny situation, where they will flower from the end of June until frost. The flowers remain open all day. Pkt. I5 cts., 2 for 25 cts.

## Pansy, "Andromeda" (ha)

Produces elegant flowers of remarkable beauty. Striking in its gay colors and elegant habit. The color is a very delicate apple-blossom-pink generally showing a soft lavender-blue or rosy lilac hue, rendered still more effective by a somewhat darker veining. It comes true from seed. Pkt. 20 cts.

## Virginia Poppy (ha) Papaver somniferum

This new, large-flowering, single Poppy produces beautiful, large, white flowers with fringed, soft pink edges. They are especially recommended for cut-flowers, for they last long in vases, especially when cut in the morning before they are full-blown. Pkt. I5 cts., 2 for 25 cts .

## $\underline{\text { Physostegia virginica compacta rosea }}$



This Erica-like flowering plant may be classed as one of the finest herbaceous sorts for border and for bedding alike. It is more compact than the ordinary variety, and produces larger flowers more abundantly. Pkt. 25c., 2 for 45 c .

## Primula Kewensis (gP)

The plant is a strong grower, with bright green leaves, numerous, erect flower-stems, 10 to 18 inches in length, producing flowers in whorls at intervals along their whole length. These are fragrant, bright yellow and nearly an inch in diameter. Pkt. 30 cts .

## Primula malacoides (gP)

A Chinese species with dainty flowers of soft lilac-pink, blooming continuously through the autumn and spring. A most useful and charming plant for green-


VIRGINIA POPPY
house culture. Height 18 inches. Pkt. 30 cts.

## Salvia splendens grandiflora aurea, "Canary Bird"

A valuable addition to the already existing shades of this indispensable bedder. Only the yellow has been wanting up to the present to complete the range of colors, so that this may well be described as the missing link of the Sages. The large, erect flower-spikes, of a decided canary-yellow, are borne in great abundance and carried well above the dark green foliage, with which they contrast admirably. Pkt. 30 cts .

## Senecio elegans pomponicus citrinus

 (hA)This charming new variety of the dwarf pompon Jacobæas grows to a height of 8 to 9 inches, and produces perfectly double, bright citron-yellow flowers of great beauty. Valuable for borders or groups and for carpet bedding; of robust and elegant habit. Pkt. 20 cts., 2 for 35 cts .

## Schizanthus retusus trimaculatus

## albus ( $h A$ )

A new, attractive variety of this showy annual, $11 / 2$ to 2 feet in height, and coming true from seed. The flowers are $11 / 2$ to $13 / 4$ inches across, and each petal bears on a white ground a large, pure golden yellow, somewhat lighter-veined spot, edged with pure white, presenting a three-blotched flower of characteristic marking. Of great effect for flowering groups and very useful as a pot-plant for the greenhouse or conservatory. Pkt. 20 cts., 2 for 35 cts .

## Scabiosa caucasica perfecta ( $h P$ )

Fine, fringed, new variety. Strikingly handsome, ruffled petals; very large, showy flowers. Pkt. 15 cts.

## Snapdragon, Double White (hP)



A new departure in the class of tall, large-flowering Snap- schizanthus retusus trimaculatus albus dragons. The flowers are white and are borne on long spikes which are literally covered. Out of the mouthlike aperture in the flowers, between the upper and lower lips, emerge abnormal fantastic petals which give a double and beardlike aspect to the very large blooms. This phenomenon is in evidence in from 50 to 60 per cent of the seedlings, the remainder producing perfect flowers of extra size. Of great value as cut-flowers for vases. Pkt. 25 cts.

## Zinnia, Double Giant (ha) Zinnia grandifora robusta plenissima

A new and distinct class of this ever-popular flower, producing large, very double blooms, from $4^{\frac{1}{2} / 2}$ to 6 inches in diameter. We offer four distinct colors, viz., Sulphur-Yellow, Crimson, Violet and Fleshcolor. Each color and mixed, pkt. I5 cts., 2 for 25 cts.


## GLADIOLI PRIMULINUS HYBRIDS (BULBS)

## Blooming in July and August

We doubt if anything more beautiful has been introduced in recent years than these lovely hybrid Gladioli. The exquisite delicacy of their coloring has rarely been approached in floral decorativeness. The range of colors and shadings is so comprehensive that scarcely anything in the way of soft color-combinations has been omitted.

The plants grow from 3 to 5 feet high, and bear large spikes of beautifully colored blooms, varying from clear yellow to crimson, the darker shades having large, soft orange or golden throats. These elegant plants were produced by hybridization with the original type from Victoria Falls, South Africa. Our bulbs are from the genuine stock, and will prove vigorous and healthy growers. Plant a few of these exquisite hybrids if you want to lend distinction to your shrubbery borders. 20 cts . each, $\$ 1.50$ per doz.

## Vegetable Seeds

Please notice that we pay postage or express charges on all seeds ordered by the packet, ounce and quarter-pound. If larger quantities are ordered, add postage or expressage at the rate of 8 cts . per pound. See fourth page.

See inside front cover of this catalogue for COMPLETE ASSORTMENTS OF VEGETABLE SEEDS of approved and choice sorts for from $\$ 2.50$ to $\$ 18$.

## ARTICHOKE

Artichaut Alcachofa 2\{rtijdocfe?
Culture.-Deep, rich, sandy loam with plenty of well-rotted manure. Sow seeds in April or May, and when large enough transplant into rows 3 or 4 feet apart and 2 feet in the rows. They reach maturity the second year. When cold weather sets in, bank the earth to the top, first cutting off and tying up the leaves so that they will occupy less space, and in the spring fork in a dressing of manure. Artichoke may also be treated as an annual by sowing the seed in hotbeds during February and transplanting in May. The heads should be cut off and used as they get ready. If left to ripen on the plant, they will exhaust it, and no more will be produced that season. Heads are unfit for culinary purposes after the flowers expand.
110 French Globe. (Seed.) The standard sort. Pkt. Io cts., oz. 30 cts., $1 / 4 \mathrm{lb} .85 \mathrm{cts}$., lb. $\$ 3$.
Jerusalem Artichoke Roots. Qt. 25 cts.
French Globe Artichoke Roots. (Ready in April.) Each I5 cts., doz. \$I.50.

## ASPARAGUS

## Asperges Esparrago Spargel

Culture.-Sow the seed thinly in rows I foot apart in April or May ( 4 or 5 lbs . to the acre), and keep down

colossal asparagus all weeds. To secure strong, healthy plants, thin the seedlings to 3 or 4 inches in the rows, saving only the strongest. The one-year-old plants should be set out in spring in rich, sandy loam, dug 18 inches deep, into which has been worked plenty of well-rotted manure. If a stiff clay soil is all that can be had, add plenty of sand and sifted coal-ashes to loosen it up, and also see that it is well underdrained. In planting for private use, set out in beds 5 feet wide, three rows in a bed, the outer being each I foot from the edge, and allow 12 inches between the rows; set the plants from 4 to 6 inches below the surface. If set out in autumn, top-dress with 6 inches of manure. For market, on a large scale, set out 4 by $11 / 2$ feet. Every fall apply a good dressing of coarse manure, after the tops have been cut, and in spring fork in. Never cut too closely. The roots need the benefit of some foliage during the year, else they will weaken and die. Slugs are easily destroyed by applying air-slaked lime or paris green. Asparagus from seed does not always come true to name.
170 Colossal. The approved standard Pkt. Oz. 1/41b. Lb. sort. The famous A rgenteuil of the French is identical with it..... \$0 o5 \$0 10 \$0 20 \$0 50 180 Palmetto. Of southern origin; a very desirable, bright green Asparagus......................... 190 Bonvalette's Giant. An improved Palmetto, said to produce larger stalks and is a stronger grower.... 200 Columbian Mammoth. Very large shoots.

| 05 | 10 | 20 | 50 |
| :--- | :--- | :--- | :--- |
| 05 | 10 | 25 | 75 |
| 05 | 10 | 25 | 75 |

## ASPARAGUS ROOTS

| Plant either in fall or spring | Per 50 | 100 | 1,000 |
| :---: | :---: | :---: | :---: |
| Colossal. 2-year-old roots | \$0 60 | \$1 00 | \$7 00 |
| Palmetto. 2-year-old root | 60 | 00 | 700 |
| Columbian Mammoth. 2-yea | 6 | 100 | 70 |

In France a business is now made of growing small, green, delicate shoots of Asparagus during the winter. Strong roots may be forced in hotbeds out-of-doors. They should be packed closely into the frames, and by making a new bed every five or six weeks these tiny shoots may be had all winter and are valuable served with omelets, green peas, etc.

## 240 BORAGE

The young leaves of this annual, which smell somewhat like a cucumber, are used as a salad, or boiled like spinach. Should be sown at intervals, as the leaves are palatable only when young. Sow in the spring, in light soil; transplant in shallow drills, a foot apart, when of six weeks' growth. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. 30 cts., lb. 90 cts.
We pay postage or express charges on all seeds bought by the packet, ounce and quarter-pound


## BEANS (Very Short Crop)

As a farinaceous food for man, the Bean is considered far superior to any other legume, and next in importance to wheat. The modern varieties leave little to be desired; the great care given to their improvement has resulted in superior sorts' greatly extending the season of use, as well as varying the flavor.

Culture.-About the first of May, if the ground is perfectly warm, select a warm, dry, sheltered spot, dig and manure slightly; make drills 2 inches deep and 18 inches to 2 feet apart; drop the beans 3 inches apart in the drills, and cover not more than 2 inches deep. Hoe well in dry weather to keep down the weeds. Sow every two weeks for a succession.

## DWARF GREEN-PODDED SNAP-BEANS

We supply packets of all Green-podded Snap Beans at ro cts. each, postpaid, other quantities NOT prepaid; add transportation charges at the rate of 5 cts . per pint, 10 cts . per quart.


320 Dwarf Horticultural. Late and productive; broad, flat, stringless pods.
340 Full Measure. Large, round pods, firm, tender, sweet and entirely stringless. Fine shipper and keeper. late. Can also be used as a shell bean..
370 Green-seeded Flageolet. Used as a shell-bean when green for many exquisite French dishes.
380 Hodson Green-Pod. A green-podded form of Hodson Wax.....
390 Longfellow. Long, straight, round, solid green pods; very early.
400 Low's Champion. Large, flat pods, stringless; fine flavor; early..
410 Marvel of Paris. Long, slender, flat pods; very early...........
420 Mohawk. Long, flat, straight pods; early; very productive.....
424 Ne Plus Ultra. Extra early; green, full, flat pods; very productive. Also suitable for forcing.
430 Osborn's Forcing. Very scarce. A most superior English dwarf Bean for forcing.
434 PRINCESS WHITE DUTCH. See Novelties....................... 440 Refugee, Late, or $1,000-$ to-1. Medium to late, productive and tender; round pod.

## DWARF GREEN-PODDED SNAP-BEANS, continued



## ENGLISH DWARF BEANS

## Feve de Marias

Haba
Grobe Bohnen
Culture.-Sow in drills 2 feet apart, as early in the spring as the ground can be worked (these are as hardy as peas), in order to get them into pod before the heat of summer. When in pod, break off the top of the plant to check the growth. Plant and hoe the same as for Dwarf Beans. A strong soil suits them best.

Properly cooked, these Beans form one of the most delicious vegetables. To each half gallon of water allow one heaped tablespoonful of salt. The Beans should be young and freshly gathered. After shelling, put them into boiling water, salted as above. Boil rapidly for fifteen or twenty minutes, then serve with a sauce of parsley and butter. Boiled bacon is often served with the Beans.
650 Broad Windsor. Largest and best of the class. Pt. I5c., qt. 30c., 1/2pk. \$1, pk. \$1.75, bus. \$6.
670 Sword Long-Pod. Smaller than Windsor. Pt. I5c., qt. $30 \mathrm{c} ., 1 / 2 \mathrm{pk} .90 \mathrm{c}$., pk. $\$ \mathrm{I} .60$, bus. $\$ 5.50$.
680 Small Horse Bean. Small size. Pt. I5 cts., qt. 25 c., $1 / 2$ pk. 85 c., pk. $\$ 1.50$, bus. $\$ 5$.

## DWARF WAX BEANS

We supply packets of all Dwarf Wax Beans at 10 cts. each, postpaid; other quantities NOT prepaid; add transportation charges at the rate of 5 cts . per pint, 10 cts. per quart.
750 Black Wax, Improved Prolific. Very early and prolific. The pods are round, full, stringless and of fine quality. Pt. 15c., qt. 30c., 1/2pk. \$I.10, pk. \$I.90, bus. \$6.50.
770 Black Wax, Currie's Rust-proof. Flat pods; early; productive. Pt. I5 cts., qt. 30 cts., $1 / 2$ pk. \$I.IO, pk. \$I.90, bus. \$6.50.
780 Black-Wax, Pencil-Pod. Slender, long, round pods. Pt. I5 cts., qt. 30 cts., $1 / 2$ pk. $\$$ I.IO, pk. \$I.90, bus. \$6.50.
784 New Kidney Wax. On style of Wardwell's Kidney Wax but with longer pods, more handsome in appearance and altogether stringless. Pt. 20c., qt. 35c., 1/2pk. \$1.25, pk. \$2, bus. \$7.
790 Davis Kidney Wax. Long, handsome, waxy white, flat pods. Pt. 20 cts ., qt. 35 cts ., $1 / 2 \mathrm{pk}$. \$1.25, pk. \$2, bus. \$7.
794 Flageolet Red Wax. Flat, yellow pods of large size; prolific. Pt. 20 cts., qt. 35 cts., $1 / 2 \mathrm{pk}$. \$1.25, pk. \$2.25, bus. \$8.
800 Golden Wax Improved. Very early; flat pods; stringless; prolific. $\mathrm{Pt} .20 \mathrm{cts} ., ~ q t .35 \mathrm{cts}$., $1 / 2$ pk. $\$$ r.25, pk. $\$ 2$, bus. $\$ 7$.
810 Golden Wax, Keeney's Rustless. Semi-round pods; medium early. Pt. 20 cts., qt. 35 cts., 1/2pk. \$1.25, pk. \$2, bus. \$7.
820 Golden-eyed Wax. Very hardy and prolific; with flat, yellow pods; early and free from rust. Pt. I5 cts., qt. 30 cts., $1 / 2 \mathrm{pk}$. $\$ \mathrm{I} .10$, pk. \$I.90, bus. $\$ 6.50$.
830 Hodson Wax. Very large, brittle and tender wax pods; enormously productive; late. Pt. 20c., qt. 35c., $1 / 2$ pk. $\$ \mathrm{I} .25$, pk. $\$ 2$, bus. $\$ 7$.

## DWARF WAX BEANS, continued

|  | Horticultural Dwarf Wax. On same style as the green-podde variety of the same name but with wax pods |  | $\begin{aligned} & \text { Qt. } \\ & \$ 0 \quad 35 \end{aligned}$ |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Michigan White Wax. Of robust and vigorous growth; pods very fleshy and of fine quality; Beans pure white. | 20 | 35 |  | 25 |  |  |  | оо |
|  | Refugee Wax, Thorburn's Stringless. A perfect Refugee, with brittle wax pods; for early or late sowing; immense yielder; late | 20 | 35 |  |  |  | о |  |  |
|  | Round-Pod Kidney Wax (Brittle Wax). Same as Wardwell's Kidney, but with round pods; late. | O | 35 |  | 5 |  | оо |  |  |
|  | addleback Wax. Long, nearly straight pods, well-rounded; golden yellow; stringless; prolific. | 20 | 35 |  | 25 |  | ı |  | 50 |
|  | ure-Crop Stringless Wax. An absolutely stringless, long, flatpod Bean and a very abundant cropper. | 25 | 35 |  | 25 |  | 25 |  | oo |
|  | Valentine Wax, Thorburn's. Round pod; | 20 | 35 |  | 25 |  |  |  |  |
| 000 | 0 Wardwell's Kidney Wax. Early; long, flat, purely waxy pods... | 20 | 35 |  | 25 |  | 25 |  | 0 |
|  | 0 White Wax, Improved Stringless. Round pods; beans pure white and of finest quality; strong grower; stringless. | 30 | 50 |  |  |  |  |  |  |
| 910 | 0 Yosemite Mammoth Wax. Late; long, thick, solid poder | 20 | 35 |  | 25 |  | 25 |  |  |

## DWARF WHITE BEANS

We supply packets of these Beans at io cts. each, postpaid; other quantities," NOT prepaid; add transportation charges at the rate of 5 cts. per pint, 10 cts. per quart. 1000 Thorburn's Dwarf Lima (The True Kumerle Strain). The dwarf Pt. $\quad$ Qt. $1 / 2 \mathrm{pk} . \quad \mathrm{Pk} . \quad \mathrm{Bus}$ form of our famous Challenger Lima-the finest of all Limas. It possesses the flavor of the genuine Challenger Lima.... \$ 1010 Burpee's Bush Lima. A bush form of the large, flat Pole Lima, growing only 18 to 20 inches high.
$\begin{array}{llllllll}0 & 25 & \$ 0 & 45 & \$ 1 & 50 & \$ 2 & 50\end{array} \$ 900$

1020 Burpee's Improved Bush Lima. An improved strain of the Burpee Bush Lima having much larger pods and Beans.......
1030 Fordhook Bush Lima. Immense pods and Beans
35
1060 Wood's Prolific Bush Lima. The Early Sieva, or Butter Bean of the South. Very productive..............................
1070 White Kidney. Excellent, either green or ripe, as a shell Bean. Pt. 20 ets., qt. 35 cts .
1080 White Marrow. Good, either as a string or shell Bean. Pt. 20 cts., qt. 35 cts.

## POLE or RUNNING BEANS

We supply packets of Pole Beans at io cts. each, postpaid; other quantities NOT prepaid; add transportation charges at the rate of 5 cts. per pint, 10 cts. per quart.

Culture.-Sow as the soil becomes warm and dry, from the first part of May (for all except Limas) to the latter part of May, in hills 4 feet apart each way. Limas should not be planted until warm weather has fairly set in. One quart of Limas will plant about roo hills, allowing four or five beans to a hill, and of the smaller sorts, about 200 hills. Poles 8 to 10 feet long should be firmly set in the hills before planting seed.
1200 Lima, Challenger. Thick and productive; best of all. Pt. 20 cts., qt. 35 cts., $1 / 2$ pk. $\$ 1.25$, pk. $\$ 2.10$, bus. $\$ 7.50$.
1204 LIMA, CARPINTERIA POLE. Beans large and thicker than the ordinary Pole Lima. Vigorous grower. Pt. 20 cts., qt. 35 cts., $1 / 2$ pk. $\$$ 1.25, pk. $\$ 2.10$, bus. $\$ 7.50$.
1210 Lima, Ideal Pole. Large pods and Beans; tender and of fine flavor; very productive. On style of Large White Lima. Pt. 20c., qt. 35c., $1 / 2$ pk. $\$ 1.25$, pk. $\$ 2$. io, bus. $\$ 7.50$.
1214 Lima, Early Jersey. Vigorous grower; very early; Beans large and tender and average three to a pod. Pt. 20 cts., qt. 35 cts., $1 / 2$ pk. $\$$ I. 25 , pk. $\$ 2.25$, bus. $\$ 8$.



## BEET

Betterave
Remolacha Salatrübe
Culture.-Sow as early in the spring as the ground can be worked ( 5 or 6 lbs . to the acre), and every two weeks after for a succession up to the first week of July. For
general crop, sow about the middle of May. The soil should

thorburn's crimson globe beet be light, sandy loam, well enriched with stable manure and plowed and harrowed until very fine. Sow in drills i foot to I5 inches apart, and when well up, thin to from 4 to 6 inches. The young Beets, with their tops, pulled out of the row, are excellent used as a spinach. For this purpose, sow frequently and use when size of a hickory nut.
1500 Bassano. Early; light color; good sort. Pkt. 5 cts., oz. I 5 cts., $1 / 4 \mathrm{lb} .40 \mathrm{cts}$., lb. \$1.50.
1520 Crimson Globe. Globular shape; flesh rich, deep crimson; tender and sweet. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb} .40 \mathrm{cts} .$, lb. \$I.50.
1540 Detroit Dark Red Turnip. Round; skin dark bloodred; flesh bright red. Pkt. 5 cts., oz. I 5 cts., $1 / 4 \mathrm{lb}$. 40 cts., lb. \$I. 50.
1550 Dewing Early. Of fine form and flavor; good for market. Lb. \$I.50.
1560 Early Blood Turnip. Dark red; fine flavor; good for winter. Pkt. 5c., oz. I5c., 1/4 lb. 40 c ., lb. $\$ \mathrm{I} .50$.
1564 EARLY YELLOW TURNIP. Fine. See Novelties Lb. \$I.50.
1570 Eclipse. Early; round; bright red. Pkt. 5 cts., oz. $15 \mathrm{cts} ., 1 / 4 \mathrm{lb} .40 \mathrm{cts} ., \mathrm{lb} . \$ \mathrm{I} .50$.
1580 Edmand Blood Turnip. A market-gardeners' strain, regular in shape and of best quality. Pkt. 5 cts., oz. I 5 cts., $1 / 4 \mathrm{lb} .40$ cts., lb. $\$ \mathrm{I} .50$.
1590 Egyptian. Extra early; flat. Lb. \$1.50.
1600 Egyptian, Crosby's. Extra early; round; dark bloodcolor. Pkt. 5 cts., oz. I 5 cts., $1 / 4$ lb. 40 cts., 1b. \$I.50.
1610 Half-Long Blood. Fine dark strain for winter. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb} .40 \mathrm{cts} ., \mathrm{lb} . \$ \mathrm{I} .50$.
1618 Lentz. Extra early; large; round; light red; small tops. Pkt. 5 cts., oz. I5 cts., $1 / 4 \mathrm{lb}$. 40 cts., lb. \$1.50.
1620 Long Smooth Blood. A good late variety for winter. Pkt. 5 cts., oz. $10 \mathrm{cts} ., 1 / 4 \mathrm{lb} .30 \mathrm{cts} ., \mathrm{lb} .80 \mathrm{cts}$.
1644 Trevise (Columbia). Red; early; flat; tender. Fine sort for table. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb}$. 40 cts ., lb. \$1.50.

## BEET, continued

| 1650 | Witham Fireball. Brilliant red flesh, solid, sweet and crisp; fine quality; Pkt. globe-shaped; very early | $\begin{aligned} & \mathrm{Oz} . \\ & \$ 0 \quad 15 \end{aligned}$ | $\begin{aligned} & 1 / 4 \mathrm{lb} . \\ & \$ 040 \end{aligned}$ |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1690 | Swiss Chard, or Silver Beet. To be used same as spinach........... ${ }^{\text {a }}$ | 10 | 35 | 1 | 00 |
| 1700 | Swiss Chard, or Silver Beet, Lucullus. Large leaves, heavily crinkled; tender and of fine flavor. | 15 | 50 | I | 50 |

FOLIAGE BEET
These varieties are grown only for their handsome foliage, which is very ornamental and decorative.

|  | Pkt. | Oz. | 1/41b. | Lb. |
| :---: | :---: | :---: | :---: | :---: |
| 77270 Golden-veined Brazilian | \$0 05 | \$0 20 | \$0 40 | \$ 125 |
| 77280 Scarlet-veined Brazilian | . 05 | 20 | 40 | I 25 |
| 77290 Crimson-veined Brazilian | 05 | 20 | 40 | I 25 |
| 77300 Scarlet-ribbed Chilian | 05 | 20 | 40 | I 25 |
| 77310 Yellow-ribbed Chilian. | 05 | 20 | 40 | I 25 |
| 77320 Victoria | 05 | 20 | 40 |  |
| 77330 Dracæna-leaved | 05 | 20 | 50 |  |

## MANGEL-WURZELS, SUGAR BEET, ETC. গunfetrübcı

Culture.-As all Mangels require a deep soil in order to grow well, plow and subsoil at least a foot to 18 inches, and apply plenty of rich stable or Thorburn's Complete Manure. Sow in May or June, in rows 18 inches to 2 feet apart, and thin to 8 inches in the rows. Young plants may be transplanted to fill up vacancies. Sow, in addition, when the plants are 3 or 4 inches high, at the rate of 200 lbs . Complete Manure, 200 lbs . bone meal and 400 lbs . salt to the acre. As soon as frost occurs, dig the crop. In order to be well preserved for gradual consumption during the winter, Mangel Wurzels should be heaped to a height of perhaps 6 feet, on a dry, sloping situation; cover at first with a piece of canvas, and, as the cold increases, this should be replaced by about 6 inches of either salt-hay, straw, seaweed or corn-stalks, with a light layer of earth on top. As soon as this surface soil becomes frozen, about 6 to 8 inches more of earth should be placed over it. By following up this gradual process of covering, all danger of heating will be obviated, and the roots will keep in perfect order. Sow from 5 to 8 pounds to the acre.

## MANGEL-WURZEL

|  |  | Oz. | 1/17. | L |
| :---: | :---: | :---: | :---: | :---: |
|  | Giant Half-Sugar Red-skinned. Longish ovoid; red skin; white flesh | .\$0 10 | \$0 25 | \$0 75 |
|  | Giant Yellow Intermediate. Very large . . . . . . . . . . . . . . . | . 10 | 20 | 60 |
|  | Golden Tankard Mangel-Wurzel. Bright yellow; handsome, sweet, | 10 | 20 | 60 |
|  | Golden Flesh Globe. Very handsome strain | . 10 | 25 | 75 |
| 1880 | Red Globe Mangel-Wurzel. Similar to Golden Globe; productive. | 10 | 25 | 75 |
|  | Mammoth Long Red Mangel-Wurzel. Very large; enormously under careful culture. | IO | 20 | 60 |
|  | Orange Globe. Productive and of good size. | 10 | 25 | 75 |
|  | Yellow Globe. Productive and of good size. | 10 | 25 | 75 |
| 195 | Yellow Ovoid. Of distinct shape; one of the most productive sorts. | 10 | 20 | 60 |
|  | SUGAR BEET |  |  |  |
|  | We recommend 5 to io lbs. to the acre. | Oz. | 1/41b. | Lb. |
| 2000 | Klein Wanzleben | . \$0 10 | \$0 20 | \$0 60 |
|  | Vilmorin Improved | 10 | 20 | 65 |
|  | White Rose-Top | 10 | 20 | 65 |
|  | White, Green-Top | 10 | 20 | 65 |
| 204 | Lane's Imperial. | 10 | 20 | 65 |

## BROCCOLI

Broccoli Broculi Spargerfohl

CUlture. - Sow early sorts as soon as the ground can be worked in the spring, in shallow drills, drawn 3 or 4 inches apart. Plant out 2 feet apart each way when the plants are about 4 inches high. Cultivate the same as cabbage, in rich soil, and use the same remedies for insect attacks. The following are sorts best adapted to this climate; they are excellent and deserve much wider culture than is usual in this country.

|  | Pkt. | Oz . | 1/4b. | Lb. |
| :---: | :---: | :---: | :---: | :---: |
| 2100 Early White | \$0 05 | \$0 25 | \$0 75 | \$2 50 |
| 2110 Mammoth White | IO | 35 | 100 | 350 |
| 2120 Purple Cape, Early | 10 | 35 | 1 I 5 | 4 0o |
| 2130 Veitch's Self-protecting | 10 | 35 | 100 | 350 |
| 2140 White Cape | 10 | 40 | 125 | 4 oo |

## BRUSSELS SPROUTS

## Chou de Bruxelles Berza de Brusels Mojenfónl

Culture.-Sow in May, in the same manner as cauliflower, and transplant in July, 1 foot apart in the rows, which should be $11 / 2$ feet apart. The Brussels Sprout is, without exception, the very best winter vegetable that can be grown. Not the least valuable point connected with it is that it is as hardy as the common curled greens. The real Sprout is not much larger than a marble, and as firm and hard almost as the stalk itself. Strip off the outer covering, cook them whole, and serve them in that fashion. When cooked through and no more, such Sprouts melt in the mouth, like the tenderest cauliflower, and are equally good.

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound.


THORBURN'S GILT-EDGE CAULIFLOWER
2160 HERCULES. See Novelties
Pkt.
$1 / 4 \mathrm{lb}$. Lb.
2170 Improved Half Dwarf. The very best and purest strain.
2190 Dalkeith. Of dwarf growth, producing large, solid Sprouts
2196 Dwarf German. Compact heads; productive.

| $\$ 0$ | 40 |  |  | Lb. |
| ---: | ---: | ---: | ---: | ---: |
| 20 | $\$ 0$ | 60 | $\$ 2$ | 00 |
| 20 |  | 60 | 2 | 00 |
| 20 |  | 60 | 2 | 00 |

## 2230 BURNET

## Pimpernelle Pimpinela ßimpernelle

The leaves have a warm, piquant taste, and are useful for salads and soups. Sow early in the spring, half an inch deep, thinly in rows. Garden. Pkt. 5 cts., oz. 10 cts., $1 / 4 \mathrm{lb} .30 \mathrm{cts} ., 1 \mathrm{lb} .90 \mathrm{cts}$.

## CAULIFLOWER

## Chou-Fleur <br> Coliflor <br> Blumentofl

Culture. - The same as for cabbage, except that extra manure and plenty of water will pay upon Cauliflower. If the soil be dry, water frequently, and, if the plants could have a heavy mulch of hay or straw, it would keep the soil moist, and they would not suffer from diought. The early kinds should be strong enough to plant out not later than the middle of April; the late kinds may be planted out same time as cabbage.
2250 Thorburn's Extra-Early Dwarf Erfurt. The best and earliest for forcing; Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb. very dwarf and compact with short stem and small leaves. Should not be confounded with entirely different sorts advertised............... \$o $50 \$ 500$ 2260 Large Early Erfurt. (Thorburn Selection.) Justly popular with marketgardeners for late crop.
$\begin{array}{llll}25 & 2 & 25\end{array} \$ 8$ oo $\$ 30$ oo
2270 THORBURN'S GILT-EDGE. Large, heavy sort, maturing immediately after, our Large Snowball. Best of all. See Novelties................. ${ }^{2}$
2280 Thorburn's Extra-Early Snowball. Our strain of this popular variety is unequaled. It is one of the best for forcing under glass or for open ground.
2290 Thorburn's Large Early Snowball. A large strain of the above.............. 2
2300 Denmark. On the style of Large Erfurt; very fine............................ 20
2310 Extra-Early Paris. Heads of medium size; first-class......................... .
2330 Lenormand Short-Stem. Has very large heads; white and firm............... io
2330 Large Algiers. Market-gardeners' popular late sort for the South............ io
2340 Thorburn's Nonpareil. A first-class standard sort............................... ro

| 10 |
| :--- |
| o5 |

$225750 \quad 28$ oo

2350 Early London. Large and hardy..

| 25 | 750 |  |
| :---: | :---: | :---: |
| 25 | 750 | 28 oo |
| 75 | 6 oo | 2200 |
| 60 | 200 | 7 oo |
| 50 | 175 | 600 |
| 60 | 200 | 7 00 |
| 50 | 1 75 | 6 oo |
| 30 | 85 | 3 oo |
| 25 |  |  |

## CABBAGE (Short crop) <br> Снои Berza de repollo תohl

Culture.-Soil for Cabbage should be rich and heavy loam, with good drainage. On such a soil, with an abundance of stable or Thorburn's Complete Manure, excellent crops are sure to be grown. For early spring, sow in fall not too early, for the plants are liable to bolt in the spring, instead of heading. In a month the plants will be fit to transplant to coldframes, where they are wintered, taking care in planting to set the young plants down to the first leaves. Transplant in spring as soon as the ground can be worked, setting the plants 2 feet apart one way and from 12 to 18 inches the other, according to the variety. If it is desirable to economize space, lettuce or radish may be sown between the rows, as they will be out of the way before the Cabbage needs the room. For late or winter crop, the seed is sown in May, and the plants set out in July. In this case, they are set in rows 2 by 3 feet, so as to work them with a horse and cultivator. To destroy the green worm, an experienced grower says: "Take one ounce of saltpeter and dissolve it in twelve quarts of water; then take a short-handled whisk-broom dip it in the solution and sprinkle the plants well. One application is sufficient unless the stuff is washed off by heavy rains. The liquid, being pertectly clear, never colors the cauliflower or Cabbage heads." To prevent the turnip flea attacking the young plants, sift fine air-slaked lime or tobacco dust over them as soon as they appear above ground.
2390 COPENHAGEN MARKET. See Novelties. Pkt. Oz. 1/41b. Lb.
2394 All

2410 Early Spring. Flat; extra early; medium size. .................................. 10 Io $30 \quad 85 \quad 3$ oo
2420 Early York. The standard English sort. Splendid............................. 05 I5 $\begin{aligned} & 40 \\ & \text { I } 25\end{aligned}$
2430 Large Early York. Larger than the above. Splendid............................ 05 I5 40 I 25
2460 EARLY JERSEY WAKEFIELD, THORBURN'S. The most popular early variety; heads very solid, pyramidal shape. See Novelties
$\begin{array}{lllll}\text { IO } & 30 & 85 & 3 & 00 \\ \text { IO } & 25 & 75 & 2 & 50\end{array}$
2464 Charleston Wakefield. Large strain of above............................... IO $25 \quad 25 \quad 250$
2470 ENKHUIZEN GLORY. Large, early, white, solid, ball-shaped heads.

2480 Stein's Improved American Early Flat Dutch. Valuable for forcing or for
2484 Early Winnigstadt. A standard second-early variety; very hard heads....... 05
2486 Express. Extra early; small, solid heads of fine quality..................... . . . 10
2490 Early Summer. Second-early; produces large and solid heads of finest quality 05
2500 Fottler's Brunswick. Of dwarf, compact growth; hard and solid heads. Good for both intermediate and winter use.

05
$30 \quad 85 \quad 3 \quad 00$


## CABBAGE, continued

2520 Succession Improved. Excellent second-early sort; large, solid heads..... \$0 io $\$ 0$ Oz.
2530 Large Late Drumhead. A standard winter Cabbage for main crop.......... . Io $\begin{array}{lllllll}\text { \$o } & \text { Io } & \$ 0 & 35 & \$ \text { I } & \text { oo } & \$ 3 \\ \text { 10 } & 50 \\ \text { 10 } & 30 & 85 & 3 & \text { oo }\end{array}$
2540 Large Late Flat Dutch. A valuable sort for market.
$\begin{array}{llll}\text { IO } \quad 30 \quad 85 & 3\end{array}$
2560 Thorburn Market-Gardener's Private Stock Flat Dutch. Fine strain of the immense winter Cabbage grown on Long Island for market.........
2580 DANISH BALL HEAD WINTER. Short stem. Very round, solid winter sort, largely grown in Denmark for the London market. A fine shipper.... Io
2584 DANISH BALLHEAD WINTER. Long stem................................. . . . . 10
2590 Green Glazed. Glossy green; suitable for hot climates.
2600 Red Berlin. Very fine; dark red; of medium size
IO
35 I 00350

2614 Red Stonehead. Prize variety from Denmark. A great improvement
on the old variety of the same name. Produces heads nearly as round
as a ball, of medium size but very solid and consequently long-keeping.
2614 Red Stonehead. Prize variety from Denmark. A great improvement
on the old variety of the same name. Produces heads nearly as round
as a ball, of medium size but very solid and consequently long-keeping.
2614 Red Stonehead. Prize variety from Denmark. A great improvement
on the old variety of the same name. Produces heads nearly as round
as a ball, of medium size but very solid and consequently long-keeping. Prefers a rather heavy soil, richly manured.

| 30 | 85 | 3 | 00 |
| :--- | :--- | :--- | :--- |
| 30 | 85 | 3 | 00 |
| 25 | 75 | 2 | 50 |
| 30 | 85 | 3 | 00 |

2620 Red Zenith. Very fine, dark red; solid head; medium early; finest of all.... Io
2630 Savoy, Early Vienna. Very small; of delicate flavor.
2640 Savoy, Early Ulm. Medium size, round deep green head; very early ..... . . . . 10
2650 Savoy, Late Drumhead. Very fine improved strain.
2660 Chinese Cabbage ( Pe -Tsai). Grows like Cos lettuce

## CARDOON

## CARDOON Cardo Earbojn

Culture.-Sow early in spring, in rows where the plants are to stand, and thin them to 2 feet apart. When full size, bind them together with bast or raffia, and earth up like celery to blanch. The stems of the leaves are used for salads, soups and stews. The stems should be wintered in a cellar away from frost.
2770 Large Solic. Smooth; grows about 4 feet high; leaves nearly free from spines. Pkt. 5 cts., oz. 20 cts ., $1 / 4 \mathrm{lb}$. 60 cts ., lb. $\$ 2$.

## CARROT

## Carotte <br> Zanahoria <br> Möhren

Culture.-Sow Nos. 2890 and 2894 as early as the ground can be worked; or, for late crop, until the latter part of July, or early in August for a winter crop. These two are the finest and most tender for table use. For main crop, sow other sorts from middle of May to the first of July. Thin out early crop to 5 inches in the row, main crop, 6 to 7 inches, the rows 10 inches apart for early crop, 14 for main crop. Hoe often and deeply between the rows. Soil should be light, and loamy, richly manured and deeply dug. Sow at the rate of 2 to 3 lbs . to the acre. Carrot-tops cut from fairly young plants may be used for pretty indoor greenery. Put one cutting into each thumb-pot, or 3 or 4 into a larger pot around the sides. Fairly good and sandy soil should be used, syringing frequently until growth is well forward. About I inch of Carrot should be left to put in soil; but this should be surrounded with soil or moss to hide it. When fully grown it is very pretty, the long fronds hanging over gracefully.
2890 Parisian Forcing, Early. Tender and
sweet; fine for early and late crops Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb. and for frames........................ io \$o 30 \$0 $85 \$ 3$ oo 2894 Bellot. Very early and tender; valuable for forcing or outdoors................... $05 \quad 25 \quad . \quad 75 \quad 250$ 2920 Oxheart Half-Short (Guerande). Very thick and short..................... 05 20 $65 \quad 225$ 2930 Scarlet Horn, Early. Very thick roots; fine for frames........................ 05 $\begin{array}{lll}25 & 75 \quad 250\end{array}$ 2950 Half-Long Pointed. A well-known strain; productive........................... $0_{5}$ $25 \quad 75 \quad 250$ 2960 Half-Long Stump-rooted. An excellent sort of good quality........................ 05 05 $25 \quad 75 \quad 2 \quad 50$ 2970 Half-Long Stump-rooted, Nantes Strain. One of the most popular sorts ......... 05 $25 \quad 75 \quad 2 \quad 50$ 2980 Carentan Half-Long Stump-rooted. Coreless; red flesh.

THORBURN'S CHANTENAY CARROT

2990 Chantenay Half-Long Stump-rooted. Style of
3020 Danvers Half-Long. Large; of good quality; productive............................. 05
3030 St. Valery. A thick, intermediate long red........................................ . . 05
3040 Long Orange. Best for stock-feeding. 05
05
05
$30 \quad 85 \quad 300$

| 15 | 40 | I 25 |  |
| :--- | :--- | :--- | :--- |
| 20 | 55 | I | 75 |


| 15 | 40 | 1 | 25 |
| :--- | :--- | :--- | :--- |
| 20 | 55 | 1 | 75 |
| 10 | 35 | 1 | 30 |

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## CELERY

## Celeri Apios Selferie

Culture.-Sow the seed in a light, rich, dry border as early as the ground can be worked, in drills 8 or io inches apart, and cover the seeds about a quarter of an inch deep, rolling or treading them in if the ground be dry. When fairly out of the seed-leaf, they may be transplanted to another bed, or they may be thinned out to 6 or 8 inches apart, and let grow until wanted to plant out in beds or trenches. The beds should be kept well weeded, and an occasional soaking with water in dry weather will do the plants good. Early in July at the North, a month or six weeks later in the Southern States, is the proper time to set the plants out in beds or trenches. Press the soil firmly against the roots. In the garden the better way is to set the plants in shallow trenches. We say shallow for it is obviously a bad plan to remove all the good soil (as must be done in a deep trench) and put the plants in that which is poor. The plants must be set in a single row in a narrow trench; or the trench may be made into a bed wide enough to hold two, three or four rows, and in this case the plants are in a compact form to be covered for the winter where they grow. This will save much labor where there is no root-cellar for storage, as often happens to be the case. When grown in beds in this way, the rows should be Ifoot apart, and the plants about 8 inches apart in the rows. The bed should be made very rich with thoroughly decomposed manure. The plants will need to be earthed up two or three times, and, in doing this, care should be taken not to let the earth get into the heart of the plant. In field culture, the plants are set on the surface in rows 4 feet apart when the Celery is to be earthed up in the field for early use, and 2 feet apart when the plants are to be taken up and blanched in the cellar for winter use. The plants are set 6 inches apart in rows. If not grown in beds, the best way to store is to dig trenches in a well-drained spot in the open ground I foot wide, and at a depth of a few inches less than the height of the Celery. The plants are then lifted and set close together. When severe cold weather comes on, cover gradually with leaves, hay or straw, and place boards on top. The turnip-rooted Celery (Celeriac) needs no earthing up, and may be planted in rows I foot apart.
3200 Thorburn's Fin de Siecle. We consider Pkt. Oz. 1/4lb. Lb. this the largest, hardiest, solidest, crispest, best-keeping and bestshipping winter Celery we know of. \$0 10 \$0 $30 \$ 085 \$ 300$ 3210 Improved White Plume. Naturally white or light foliage; requires but little banking up to blanch; very early and extensively grown for market... 10
$25 \quad 75 \quad 250$ 3214 Golden Self-blanching. American-grown;
large; golden yellow............... 3214 Golden Self-blanching. American-grown;
large; golden yellow............... I5 $\begin{array}{llll}60 & 2 & 25 & 800\end{array}$ 3230 GOLDEN SELF-BLANCHING, THOR-
BURN'S GILT-EDGE. Our finest
strain. See Novelties................ I5 3230 GOLDEN SELF-BLANCHING, THOR-
BURN'S GILT-EDGE. Our finest
strain. See Novelties................ I5
$\begin{array}{lllll}85 & 3 & 25 & 12 & 00\end{array}$ 3240 Rose-ribbed Golden Self-blanching. 3240 Rose-ribbed Golden Self-blanching. Fine.
 and largest of winter varieties, either for family- or market-garden. The heart is golden yellow.

05
35 I $00 \quad 350$ 3260 Perfection Heartwell. One of the finest
$\qquad$ firm, golden yellow heart.......isp; 05 IO t Pascal. An easily blanched and fine-keeping, large, late sort. ........ 3310 Kalamazoo. A fine, half-dwarf, solid white variety...................... 055
20

| 20 | 60 | 200 |
| :--- | :--- | :--- |
| 20 | 60 | 2 |

3344 Giant Golden Heart. Very large, solid and fine-flavored; vigorous grower....... 05
3350 New Rose. Fine flavor; handsome....... 05
3360 Pink Plume. Same as White Plume, except that the stalks are tinged with pink. Attractive; rich flavor and long-keeper.
.05

| and long-keeper.................... 05 | 25 | 75 | 2 | 50 |
| :---: | :---: | :---: | :---: | :---: |
| 3384 Winter Queen. Very large, solid, green, winter sort; blanches well. | 20 | 60 | 00 |  |
| 3388 Silver-White. Large; fine, solid and crisp variety............................... . 05 | 20 | 60 | 2 | 00 |
| 3400 Celeriac, Giant Prague. Very large roots, for soups and stews; when cooked and sliced makes fine winter salad. . . . 05 | 25 | 75 | 2 | 50 |
| 3420 Celeriac, Apple. Has small foliage and small, smooth roots; for soups.. | 30 | 85 |  | 00 |

3384 Winter Queen. Very large, solid, green, winter sort; blanches well.

| 20 | 60 | 2 | 00 |
| :--- | :--- | :--- | :--- |
| 20 | 60 | 2 | 00 |

Celeriac may be stored like beets, and will keep all winter PLUME CELERY We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## CORN, SWEET or SUGAR

We supply packets of Corn at 10 cts. each, postpaid; for other quantities, NOT PREPAID, add transportation charges at the rate of 5 cts . per pint, 10 cts . per quart.

Culture.-Plant in hills 3 feet apart each way, and five or six kernels in a hill. Hoe often and draw soil up to the stem; break off side-shoots. Make the ground rich with well-rotted manure. If sown thinly in drills, a greater yield from a given surface will be obtained.

Most Corns can be furnished on ears at 5 cts. each, transportation extra

## EXTRA-EARLY

3700 THORBURN'S NORDHEIM EXTRA-EARLY. Earliest and finest of all. See Novelties. Pt. 30 cts., qt. 50 cts., $1 / 2$ pk. $\$$ I. 50 , pk. $\$ 2.50$, bus. $\$ 9$.
3710 Early Red-Cob Cory. A very early variety with good-sized ears. Pt. 15 cts., qt. $25 \mathrm{cts} ., 1 / 2 \mathrm{pk} .85 \mathrm{cts}$., pk. $\$$ I.50, bus. $\$ 5$.


EARLY EVERGREEN SWEET CORN

3720 White Cory. Resembles the ordinary Cory, but with white cob. Pt. I5 cts., qt. 25 cts., $1 / 2$ pk. 75 cts., pk. $\$ \mathrm{I} .30$, bus. $\$ 4.50$.
3734 Earliest Catawba. Similar to Golden Bantam in growth and earliness, but it differs from it in color and flavor. Grows 4 or 5 feet high, and bears from one to five good-sized ears to a stalk. Pt. 15 cts., qt. 25 cts., $1 / 2 \mathrm{pk}$. 85 cts., pk. \$I.50, 2 bus. $\$ 5$.
3740 Mammoth White Cory. Ears double the size of the old Cory. Pt. I 5 cts., qt. 25 cts., $1 / 2$ pk. 75 cts., pk. $\$ \mathrm{I} .30$, bus. $\$ 4.50$.
3750 Metropolitan. Large, handsome ears of fine quality; very early. Pt. I5 cts., qt. 25 cts., $1 / 2$ pk. 75 cts., pk. $\$ \mathrm{I} .30$, bus. $\$ 4.50$.
3760 Golden Bantam. Extra-early; yellow; very sweet and tender. Pt. i5 cts., qt. $30 \mathrm{cts} ., 1 / 2 \mathrm{pk}$. $\$ \mathrm{I}$, pk. $\$ \mathrm{I} .75$, bus. $\$ 6$.
3764 Seymour's Sweet Orange. A vigorous grower, attaining a height of 6 or 7 feet, and producing generally two good-sized ears to a stalk. It matures about a week later than Golden Bantam and is fully equal to it in the deliciousness of its flavor. Pt. I5 cts., qt. 30 cts., $1 / 2$ pk. $\$ \mathrm{I}, \mathrm{pk} . \$ \mathrm{I} .75$, bus. \$6.
3770 Premo. Extra-early; very large ears; fine quality. Pt. 15 cts., qt. 25 cts., $1 / 2 \mathrm{pk} .75$ cts., pk. \$1.30, bus. $\$ 4.50$.
3780 Peep-o'-Day. One of the earliest; very sweet and of delicate flavor. Pt. I5 cts., qt. 25 cts., $1 / 2 \mathrm{pk}$. 75 cts., pk. \$I.30, bus. \$4.50.
3790 Minnesota. Nearly as early as Cory, but with larger ears. Pt. I 5 cts., qt. $25 \mathrm{cts} ., 1 / 2 \mathrm{pk} .75 \mathrm{cts} ., \mathrm{pk} . \$ \mathrm{I} .30$, bus. $\$ 4.50$.
3800 Perry Hybrid. Very early and of large size; valuable for market. Pt. I5 cts., qt. 25 cts., $1 / 2$ pk. 75 cts., pk. $\$ \mathrm{I} .25$, bus. $\$ 4$.
3840 Kendel's Giant. Very early for so largeeared a sort; fine quality. Pt. I5 cts., qt. 25 cts., $1 / 2$ pk. 75 cts., pk. $\$ \mathrm{I} .30$, bus. $\$ 4.50$.
3860 Extra-Early Adams. Not a Sugar Corn but grown for early use. Pt. 15 cts ., qt. 20 cts., $1 / 2$ pk. 60 cts., pk. $\$$ L., bus. \$3.50.

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## SECOND-EARLY or INTERMEDIATE CORN

|  | horburn's Early White Perfection. A valuable second-early sort, producing good-sized ears. The cob is small and the grain is almost white. It is a heavy yielder, very sweet and an almost perfect type without flint or glaze.. |  | Qt. \$0 30 | \$1 00 | Pk. \$ 17 | Bus $\$ 6$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 391 | Early Champion. Very large ears, considering its earline |  | 25 | 75 | 30 | 450 |
| 3920 | Shaker. Very large; white grains; quite early | 15 | 25 | 75 | 30 | 450 |
| 3930 | Early Mammoth. Very large ears; fine quality; not v | 15 | 25 | 75 | I 30 | 450 |
| 3940 | Crosby. Matures after Minnesota; fair-sized ears of good quality |  | 25 | 75 | 30 | 450 |
| 3950 | Potter Excelsior. Good-sized ears of fine quality | 15 | 25 | 75 |  | 450 |
| 3960 | Moore Concord. Of strong growth; ears large and | 15 | 25 | 75 | I 25 | 00 |
| 3970 | Early Evergreen. A week earlier than Stowell Evergreen | 15 | 25 | 75 |  |  |
| 3980 | Early Adams. Not a Sugar Corn, but grown extensively for market | 15 | 20 | 60 | I 00 |  |

## GENERAL CROP


LATE SWEET CORN
4100 Black Mexican. Very sweet and of superior flavor; grains black..... I5
4120 Late Mammoth. Rank in growth; large ears, rich and sweet.......... . I5
$25 \quad 75$ I 30450
4140 Country Gentleman. A large selection of the Ne Plus Ultra, intro-
duced by us in $1888 \ldots .$. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . I $_{5}$
duced by us in $1888 . .$. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . I $_{5}$
25
$75 \quad 130 \quad 450$
$25 \quad 75$ I $30 \quad 450$
4180 Sweet Fodder Corn. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 15

## For Field Corn and Pop Corn, see page 65

## CHERVIL

## Cerfeuil Perifollo Benjenlaud

Culture.-Cultivate and use the curled variety of Chervil like parsley. Sow at any time in the spring in shallow drills, I foot apart, in well-prepared ground. The seed of the tuberous Chervil should be sown in September, and it will appear the following spring. $\quad \mathrm{Pkt}$. Oz . $1 / \mathrm{llb}$. Lb . 4240 Curled. Leaves used for flavoring soups and stews and for garnishing.... \$o o5 \$o io \$0 35 \$I oo 4250 Plain. Like above, but not curled . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . o5 10 io 30 85

## CHICORY

4300 Common or Wild. Used in Barbe de Capucin, a salad much made in Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb.
France. Sown in June, the roots are transplanted in autumn into sand in a cellar. The young shoots form the Barbe de Capucin.............\$0 05 \$0 $20 \$ 00^{2} \$ 50$ 4310 Witloof. Known in restaurants as French Endive. Sown in May and June in drills. Transplant or thin to 6 inches; treat as Endive, except that late in summer or fall it should be gradually banked up like celery. The stalks, when blanched, make a delicious salad. It is used by the French as a boiled vegetable............................................................ . . . . . 05

| 20 | 55 | I | 75 |
| :--- | :--- | :--- | :--- |

4320 Magdeburg. Roots are the Chicory of commerce. ........................... 05 20 50 I 50

See, also, Endive, the Chicory of the French, page 29

## COLLARDS

Culture.-Sow seed as for cabbage, in June, July and August for succession. Transplant when a month old in rows a foot apart each way and hoe often.
4380 Georgia. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb} .25 \mathrm{cts} ., \mathrm{lb} .75 \mathrm{cts}$.

## CORN SALAD, or FETTICUS

## Mache <br> Macha o Valerianilla <br> Stedjialat

Culture.-Sow during August or early in September, in drills one-fourth of an inch deep and 6 inches apart. If the weather is dry when the seed is sown, tread it lightly to insure germination. Keep weeds down with hoe. Just before the winter cover thinly with straw or leaves.


We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


THORBURN'S NOROTON SELECTED WHITE SPINE CUCUMBER

## CRESS

## Cresson Berra o Mastuerzo Sreffe

Culture.-Sow No. 4520 thickly in shallow drills, every two or three weeks. It should be cut often and it will continue to grow. It is useful not only for salad, but for the breakfast table and for garnishing. Nos. 4550 and 4570 should be sown in damp soil; or, if a stream of water can be utilized, they will be much finer. They will also thrive well in damp hotbeds. Rightly managed, their culture is very profitable. To obtain early salad, it is a good plan to sow with Water Cress seed a strip 4 inches wide on the outer margin of a hotbed, inside the frame, where it is always cool.
Pkt. Oz. 1/4b. Lb.


## DANDELION

Pissenlit Amargon Fardeblum
Culture.-Dandelion is a hardy perennial, and one of the most desirable early spring salads. Sow in early spring in drills one-half an inch deep and 18 inches apart; thin out the plants to 12 inches. Keep clear of weeds during the summer, and the ensuing spring the leaves will be fit to cut. They are best, however, when blanched, which makes them tender and destroys, to some extent, their bitter taste without impairing the qualities which make them desirable as greens. The blanching may be done by placing a couple of boards over the rows thus: $\wedge$. This excludes the light and improves the greens, rendering them far superior to those found growing wild.

## CUCUMBER

## Concombre Pepino surfe

Culture.-For very early, sow in hotbeds upon pieces of sod, or in small pots. They can be readily transplanted with a gain of about six weeks over those sown in the open ground. Plant out in rich soil when danger of frost is over, or protect by hand-glasses, or by paper held down at the corners with a handful of earth. For general crops, sow in the open ground as soon as the weather is settled and warm, and every two weeks for a succession. For pickles, sow from middle of June to first week in July. Sod land, turned over in fall, is the best for them. Plant in hills 4 feet apart, putting a shovelful of well-rotted manure in each hill.
4750 Cumberland. One of the best pickling sorts yet introduced, being very Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb . handsome and productive, with flesh firm, but very crisp and tender....\$0 o5 \$0 15 \$0 30 \$I oo 4770 Davis Perfect. Fine for forcing or for outdoors. The fruit is long and straight, and, being a comparatively shy seeder, is very valuable for slicing...... 05
4780 Early Green Cluster. Fruit small and in clusters; very prolific.............. 05
4790 Early Russian. Very early, short; fine for pickles. .......................... . . . . 05
4800 Giant Pera. Very long; one of the best for table use...................... . . . 05
4810 Fordhook Pickling. Very prolific; medium size; fine pickling strain........... . . 05

| 15 | 30 | 1 | 00 |
| ---: | ---: | ---: | ---: |
| 10 | 25 |  | 80 |
| 10 | 25 |  | 80 |
| 15 | 40 | 1 | 25 |
| 10 | 25 |  | 80 |
|  |  |  |  |
| 10 | 25 |  | 80 |

$4820 \begin{gathered}\text { Thorburn Everbearing. Small-sized; very early and enormously produc- } \\ \text { tive; valuable as a green pickler.................................................. io } 25\end{gathered}$ io 80 We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## CUCUMBER, continued

|  | Cool and Crisp. Extra early and very prolific; long, straight, slender and Pkt. very dark green; good either for pickling or slicing. | \$0 15 | $\begin{aligned} & 1 / 1 \mathrm{lb} . \\ & \$ 0 \quad 30 \end{aligned}$ | $\$ \mathrm{Lb} \text { ioo }$ |
| :---: | :---: | :---: | :---: | :---: |
|  | Early Short Green. Good for pickling; productive. . . . . . . . . . . . . . . . . . . . 05 | 10 | 25 | 80 |
|  | Fordhook Famous. Long, straight and well-formed; vigorous grower, very productive; does not turn yellow. | 15 | 30 | 0 |
| 485 | Klondyke. A fine strain on the style of White Spine . . . . . . . . . . . . . . . . . 05 | 15 | 30 | 100 |
| 4860 | New Orleans Market. For forcing or open ground; very productive...... . 05 | 15 | 30 | I 00 |
| 4864 | White Spine Extra-Early. An extra-early strain of the popular White Spir | 15 | 30 | I 00 |
| 4870 | * Improved. A very handsome and uniform early variety | 15 | 30 | 100 |
| 4880 | " Arlington. Fine either for forcing or for outdoor | 15 | 30 | 100 |
| 4890 | " THORBURN'S NOROTON SELECTED. See Novelties........ 10 | 25 | 65 | 00 |
| 4900 | " " Extra-Long. A beautiful, large and well-shaped Cucumber.... 05 | 15 | 40 | 25 |
| 4910 | Evergreen. Very early and prolific; deep green color...................... . 05 | 15 | 30 | 00 |
| 4920 | Improved Long Green. Long and crisp; a popular variety for pickles...... . 05 | 15 | 30 | 00 |
| 4930 | Long Green Turkey. Fruit very long and rather slim.................... . 05 | 15 | 30 | 00 |
| 4940 | Green Prolific Pickling. One of the best for pickling; dark green......... . . 05 | 15 | 30 | 00 |
| 4950 | Nichol Medium Green. Most symmetrical and a very fine table sort. . . . . . 05 | 15 | 30 | I 00 |
| 4960 | Tailby Hybrid. Very long, and superior for table use...................... . 05 | 15 | 30 | 100 |
| 4970 | Japan Climbing. Good for frames or open ground......................... 05 | 15 | 30 | 00 |
| 4980 | Small Gherkin. Very small bur; used for pickles........................ . 10 | 20 | 50 | 50 |
| 4990 | Lemon Cucumber, or Garden Lemon. Almost round; yellow and green markings; tender and of sweet flavor. Resembles a lemon in appearance. io | 20 | 50 |  |

## ENGLISH CUCUMBER FOR FRAMES

(Concombre espèces Anglaises pour Couches)
Culture.-Sow seeds in October, November or December, according to the time they are wanted, in


THORBURN'S IMPROVED NEW YORK PURPLE EGGPLANT (See page 30) small pots, in fibrous loam, lightened and enriched with old manure; give plenty of air and water. Plunge the pots in a frame near the glass, where there is a little bottom heat, and keep them covered with brown paper until the seeds germinate. Afterward uncover and ventilate to insure sturdiness of habit. More seeds should be sown than plants required, as some may fail to grow and others may be weaklings. Only stiong plants should be employed. It is necessary to fertilize the pistillate flowers with the staminate, to render the vines productive, as, owing to the absence of insects, they will not produce a crop under glass as in open ground. 5096 Hurst's Monarch. Splendid sort. Pkt. 25 cts. 5100 Lockie's Perfection. Fine color. Pkt. 25 cts.
5110 Marvel (Hurst's). Fine shape; heavy cropper. Pkt. 25 cts.
5120 Rochford's Market. Fine variety. Pkt. 25 cts. 5130 Telegraph. Free-bearing; handsome. Pkt. 25 c. 5160 Veitch's Sensation. Fine dark variety. Pkt. 25 c.

## ENDIVE, or CHICORY

Chicoree 图 Escarola o Endivia Enbivie

Culture.-Sow in June, July and August; cover lightly; when up, thin out to 8 inches apart and water well, if dry. When the leaves are 6 to 8 inches long, blanch by tying together near the top with yarn or raffia. (They must be quite dry, or they will rot.) At the approach of winter, take up carefully, with a ball of earth to each plant, and place close together in frame or cellar. They must be kept dry and have plenty of air.
5210 Green Curled Winter. Standard sort for fall and winter crop. Pkt. 5 cts ., oz. I 5 cts ., $1 / 4 \mathrm{lb}$. $30 \mathrm{cts} ., \mathrm{lb}$. \$r.
5220 Large Green Curled (de Ruffec). Broad ribs; fine for fall and winter. Pkt. 5 cts., oz. I5 cts., $1 / 4 \mathrm{lb} .30 \mathrm{cts} ., \mathrm{lb} . \$ \mathrm{I}$.
5230 Broad-leaved (Escarolle). A sweet variety; fall and winter. Pkt. 5 cts., oz. I5 cts., $1 / 4 \mathrm{lb}$. 30 cts., lb. \$I.
5240 White Curled. For early use. Pkt. 10 cts ., oz. $25 \mathrm{cts} ., 1 / 4 \mathrm{lb} .65 \mathrm{cts} ., \mathrm{lb} . \$ 2$.
See, also, Witloof (French Endive) under Chicory, page 27
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## EGGPLANT


#### Abstract

Aubergine Berengena Eierpflanze Culture.-Sow in hotbeds very early in spring and transplant when 2 inches high into a second bed or into small pots. If this is not done, thin to 4 inches apart. Do not plant out until weather is perfectly settled and warm. Cool nights or wet weather will check them. Keep some back in frames for a second planting, in case of weather changing unexpectedly. Set out plants 3 feet by 2 . 5310 Improved $N \in W$ York Spineless. The standard; largest and best; large, Pkt. Oz. 1/41b. Lb. oval; deep purple; early and productive. . . . . . . . . . . . . . . . . . . . . . . . . . \$0 1о \$0 40 \$1 25 \$4 00 5320 BLACK BEAUTY. As large as the New York Improved but about ten days earlier; very rich purplish black. See Novelties. . . . . . . . . . . . . . . . . . . . . . . . 10

40 I $30 \quad 450$ 5330 Early Dwarf Purple. Dwarf; very early; small, ovoid fruit. ................... . 10 io 35 I oo 350 5340 Florida High Bush. Purple, though not so deep as the New York Spineless, which it resembles in shape. Very productive, of vigorous growth, and can stand more cold than that variety. 5350 Long Purple. Of distinct shape and fine quality............................ . . . 05 5360 Round Purple. Of good quality; fine color and shape. . . . . . . . . . . . . . . . . . . . io 5370 Black Pekin. Round, blackish purple fruit; dark foliage..................... . . . וо 5380 Scarlet Chinese. Small and ornamental.......................................... . . . . 10 5390 Round White. Small and ornamental. 10 5400 Long White. Small and ornamental IO 5410 Striped. Purple and white. IO


## 14180 FENNEL, FLORENCE or NAPLES

## Fenouil de Florece Finocchio di Napoli

Culture.- Sow in spring, in rows 16 to 20 inches apart. Thin out so as to have the seedlings 5 or 6 inches apart and water as plentifully as possible. The plant is usually eaten boiled. In flavor it resembles celery, but has a sweet taste and a more delicate odor. Pkt. $5 \mathrm{cts} .$, oz. Io cts., $114 \mathrm{lb} .25 \mathrm{cts} ., \mathrm{lb} .75 \mathrm{cts}$.

## 5550 ICE-PLANT

Culture.-Sow in good garden soil as soon as the ground becomes warm in spring, in shallow drills I foot apart. Thrives well in hot, dry climates. Pkt. 5 cts., oz. 35 cts .

## KALE, or BORECOLE

(Very short crop)
Chou vert Frise Col תrauffogl
Culture. - Nos. 5600 to 5620 are cultivated and grown exactly like cabbage. Sow No. 5600 in August and September for early greens. Sow 5700 early in the spring in a hotbed, and when I or 2 inches high transplant into a bed or border that has been highly manured and deeply dug. Sea Kale is not fit to eat until it has been blanched, either under large pots, or by banking up with sand.
5600 Curled Dwarf Green Scotch. Very dwarf and spreading; best strain; largely grown in the South, being sown in August and September. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. 30 cts., 1 lb .90 cts.
5610 Curled Tall Green Scotch. A taller growth of No. 5600. Pkt. 5 cts., oz. 10 cts., $1 / 4 \mathrm{lb} .30$ cts., lb .90 cts.
5620 Curled Dwarf Brown. Very hardy. Pkt. 5 cts., oz. IOc., $1 / 4 \mathrm{lb} .30 \mathrm{c} ., \mathrm{lb} .90 \mathrm{c}$.
5630 Curled Siberian Thorburn Improved. Green curled; hardy. Pkt. 5 cts., oz. 10 cts., $1 / 4 \mathrm{lb}$. 20 cts., lb. 60 cts.
5640 Thousand-headed. Valuable for cattle. Pkt. 5c., oz., 10c., 1/41b. 25c., lb. 75c.
5650 Jersey Winter Kale, or Cow Cabbage. For feeding cattle; very hardy. Pkt. 5 cts., oz. IO cts., $1 / 4 \mathrm{lb} .25$ cts., lb. 75 c .
5700 Sea Kale. Fine; resembles celery. Pkt. 10 cts., oz. 20 cts., $1 / 4 \mathrm{lb}$. 60 cts ., lb. $\$ 2$.


WHITE vIENNA KOHLRABI

# KOHLRABI <br> Chou-Rave <br> Colinabo $\quad$ ロロhlrabi 

Culture.-Sow in spring, in rows 18 inches apart, afterward thinning the plants to 8 to 10 inches. If the weather is suitable the thinnings may be planted, but it is considered difficult to transplant. Keep the weeds down, and when the thickened stems above ground are 2 or 3 inches through they are fit to eat, and should be used at once, being tough when old. Cook same as turnips.
5800 Early White Vienna. Handsome in Pkt. Oz. 1/41b. Lb. appearance and very delicate in flavor; white ball................. \$o o5 \$0 20 \$0 60 \$I 75 5810 Early White Vienna. Fine flavor and appearance. For frames. ............ . io $25 \quad 75250$ 5820 Early Purple Vienna. Purple ball; a very good sort. . . . . . . . . . . . . . . . . . . . $o_{5}$ 5830 Early Purple Vienna. For frames. . . . . . . IO 0 20 $60 \quad 200$ productive $\qquad$ 05

## LEEK

## PoIread Puerro Forree, doer saud

Culture.-Sow very early in spring in drills 6 inches apart and $x$ inch deep. Thin out to I inch. When about 7 inches high, transplant in rows 12 inches apart, as deep as possible, but do not cover the young center leaves. Water thoroughly if dry when planted out. Draw earth up to them as they grow; rich soil is required. Take up and store in earth in a cool cellar before winter weather. The seeds may also be sown in September, and the young plants transplanted in spring to where they are to remain.5910 THORBURN'S BEST LARGE FLAG. Pkt. Oz. ${ }^{1} 1 \mathrm{lb}$. Lb.
Hardy and productive . . . . . . . . . \$o o5 \$o 20 \$o $65 \$ 225$ 5940 Large Carentan. Distinct and darkcolored leaves; stout in habit, and hardy . . . . . . . . . . . . . . . . . . . . . . . . . . 05

## LETTUCE

## Laitue

Lechuga
Salat
Culture.-Sow 6030, 6090, 6114 and 6230 in hotbeds in March, and in the open ground as soon as it can be worked, and transplant to rows 8 inches apart. Sow in two weeks' time same varieties again for a succession; also, Cos sorts. Latter part of August sow any of the varieties. In October some of these may be planted in frames, to head in winter and early spring. Always sow thinly and thin out well, or the plants will not be strong. The last spring sowing had better be grown where sown, being thinned out to 6 to 8 inches apart. Cos Lettuce may be sown in a hotbed early in the year, and transplanted to a coldframe, so as to have good plants to set out at the opening of the ground. Lettuce requires good ground, enriched with thoroughly rotted manure, and well pulverized. The after-culture should be close and careful, to secure the best results. Lettuce seldom, if ever, heads well in hot weather. w. s. stands for white-seeded, b. s. for black-seeded 6020 American Gathering. Twisted and curled leaves; fine early or late Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb. 6030 THORBURN'S BIG BOSTON. Fine for forcing in coldframes or for open
 6040 Buttercup. Yellow, solid, small heads; for forcing or outdoors. w. s......... . 05 6050 California Cream Butter. Very large, solid heads; inside very white. b. s..... 05

| 20 | 50 | 1 | 50 |
| :--- | :--- | :--- | :--- |
| 20 | 50 | 1 | 50 |
| 15 | 35 | 1 | 25 |
| 15 | 35 | 1 | 25 |
| 15 | 35 | 1 | 00 |
| 15 | 35 | 1 | 00 |
| 10 | 50 | 1 | 50 |
|  |  |  |  |
| 15 | 35 | 1 | 25 |
| 20 | 60 | 2 | 00 |
| 15 | 35 | 1 | 25 | 6060 Coldframe White Cabbage. For starting in coldframes and setting out

 6070 Deacon. Large, solid, summer cabbage variety. w. s........................ . . . 05
6080 Denver Market. Very curly heads; good for forcing or outdoors. w.s.... . . . . . . 05
6090 Emperor Forcing Improved. Yellow; earliest of all; only for frames. w. s. . . 05 5 bright green, inside crystal-white; yellow heart; crisp, tender. w. s...... 05
6114 Glasshouse, Thorburn's. For forcing under glass. w. s....................... . 05
6120 Grand Rapids Forcing. Large, tender; one of the best for forcing. b. s...... 05 I5 35
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


FIELD OF THORBURN BIG BOSTON LETTUCE

| LETTUCE, continued Pkt. |  |  | Lb. |
| :---: | :---: | :---: | :---: |
| 0 G |  |  |  |
| Hanson Improved. Very large and solid; tender and of fine quality; withstands the hot sun well. $w$, s. | 15 | 35 | I 25 |
| Hothouse. Fine forcing variety. w. s.......... . . . . . . . . . . . . . . . . . . . . . . . . 05 | 0 | 60 | 200 |
| Hubbard Market. A large cabbage variety, with crisp, tender leaves; for forcing or open ground. w. s. | 15 | 35 | 25 |
| Iceberg. Large, solid, curled heads; yellow heart; crisp and tender. w. s. 05 | 15 | 35 | 25 |
| Mammoth Black-seeded Butter, Thorburn. A selected strain; large, solid, yellow heads. Favorite variety of New York market-gardeners. | 15 | 35 | 25 |
| Market-Gardeners' Private Stock, Thorburn. A selected strain; solid, large heads, resisting the sun for a long time before shooting. b. s....... 05 | 20 | 50 | 50 |
| Maximum Thorburn. The largest, solidest, crispest and best; leaves tender and particularly fine in flavor. b. s. | 20 | 55 | 75 |
| 30 MAY KING. Large, round, solid heads. w. s................................ . . 05 | 20 | 50 | 50 |
| 6240 Mignonette. Distinct russet colored; very solid and compact. b. s......... . 05 | 20 | 50 | 50 |
| 6250 New York Cabbage. Large, solid heads; inside very white. | 5 | 35 | 25 |
| 6260 Oak Leaf. A curled-leaf variety of bright green color. w. s............ . . . . . . 05 | 20 | 55 | I 75 |
| Passion. A medium-sized cabbage variety, with tender, crisp and fine-flavored leaves; popular in the South. b. s............................................ . . 05 | 15 | 35 | I 25 |
| 90 Rheingold. Large, solid heads; pure golden yellow; tender, delicious and crisp leaves. Fine forcer | 20 | 50 | 50 |
| 00 Salamander Improved. Fine, compact heads; tender; quality of the best; resists summer heat. b. s...................................................... 05 | 15 | 35 | 25 |
| 10 Shotwell Brownhead. Large, handsome, tender heads; very hardy. b. s...... 05 | 20 | 5 | 50 |
| 6320 Simpson Early Curled. A leading early sort; very tender. w. s............ . 05 | 15 | 35 | 25 |
| 6330 Simpson Black Seed. A superior variety; large, and of light color. b. s..... . 05 | 15 | 35 | 25 |
| 630 Tennisball White Seed (Boston Market). A well-known forcer; large heads; crisp and tender. w. s.. .................... . . . . . . . . . . . . . . . . . . . . . . . . . . . . 05 | 15 | 35 | 25 |
| 50 Tennisball Black Seed. Forms close, hard heads; for forcing. b. s........... 05 | 15 | 35 | 25 |
| 660 Trocadero. Hardy; for spring or summer; green, tinged russet; very tender, crisp and fine-flavored. w. s.................................................... . . . 05 | 20 | 55 | 75 |
| 6380 French Yellow Winter. The finest of all coldframe sorts. b. s. ........... . . . 05 | 20 | 55 | 75 |

We pay postage or express charges on all seeds bought by the packet, ounce or quadter-pound

## ROMAINE, or COS LETTUCE

6440 Bath Cos, Black-seeded. Pale green leaves, slightly tinged with brown. Early and productive and of fine flavor. b. s. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb}$. 50 cts. , lb. $\$ \mathrm{I} .50$.
6450 White Paris Cos. Of upright growth; fine. w. s. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb}$. 35 cts., lb. \$1.25.
6460 Trianon Cos. Resists heat well. w. s. Pkt. 5 cts., oz. 20 cts . $1 / 4 \mathrm{lb}$. 50 cts ., 1 b . $\$ \mathrm{I} .50$.
6470 Express Cos. A fine, very dwarf early sort, requiring no tying up. w. s. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb}$. 35 cts., lb. \$1.25.
6480 Balloon Cos. Fine sort. b. s. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb}$. $50 \mathrm{cts} ., \mathrm{lb}$. \$1.50.
6490 GOLDEN YELLOW COS. Long-standing; solid; golden yellow. See Novelties. Pkt. 5 cts., oz. 20 cts., 1/41b. 60 cts ., lb. \$2.


HEAD OF THORBURN BIG BOSTON LETTUCE

6500 RED COS. Splendid French sort. Outer leaves red-brown; very attractive. See Novelties. Pkt. 5c., oz. 20c., 1/41b. 50c., lb. \$1.50.

## MUSTARD

Moutarde Mostaza Senf
Culture.-Sow thickly during early spring, in shallow drills, and press the earth well down. For fall salad, sow in September, or in frames or boxes during winter.
6650 Black. These seeds form the mustard of commerce.

 \$0 o5 \$0 10 \$0 25

6680 Chinese Broad-leaved. Leaves of agreeable flavor when cooked like spinach. 05 ll $10 \quad 20 \quad 50$
6684 Elephant's Ear. Immense, light green leaves . . . . . . . . . . . . . . . . . . . . . . . . . 05 10 20 . 50
6690 Fordhook Fancy. Very ornamental; plants of vigorous growth; leaves dark $\begin{array}{lllllll}\text { green, curved outwardly. If used as a vegetable, cook like spinach..... } 05 & 10 & 20 & 50\end{array}$
6700 Ostrich Plume. Leaves curled and frilled like an ostrich plume.............. o5 5 Io $20 \quad 50$

## MELON, MUSK (Cantaloup)

Culture.- Select a light, rich, sandy soil, and, after all danger of frosts is over and the ground has become warm and dry, plant in hills 4 to 6 feet apart each way, six to twelve seeds to a hill. When up and all danger of insects has passed, pull out all but three plants. Cultivate until the vines cover the ground, and pinch the ends of the growing shoots to induce early fruiting. Ashes, lime, or even dry road-dust are excellent to sift over young plants when the dew is on, to prevent the attacks of insects. A few hills for early use may be had by sowing in hotbeds, on pieces of sod or in pots. The seed may also be started out-of-doors under hand frames or glasses. It is quite important that proper soil be selected for growing Muskmelons.

## SALMON-FLESHED VARIETIES <br> Pkt. Oz. 1/11b. Lb.

 6780 Baltimore Market. Oblong; orange flesh, of fine quality; intermediate. . . \$o o5 \$o is \$0 35 \$I oo 6790 Banquet. Beautifully netted, medium size; rich salmon flesh, fine quality.... $05 \quad 15 \quad 15 \quad 35 \quad 1 \quad 25$6800 Burrell's Gem. Reddish orange flesh; fine-grained and spicy.................... o5 15 i5 35 i 00
6804 Defender. One of the very best yellow-fleshed sorts; medium size, oval in $\begin{array}{llllllllll}\text { shape; } & \text { flesh very firm and rich. Very vigorous and productive.......... } & 05 & 15 & 35 & 1 & 25\end{array}$
6810 Emerald Gem. Small; extra early; dark green skin, orange flesh; very sweet. o5 $\quad 15 \quad 35 \quad 1 \quad 25$
6812 Long Yellow Cantaloup. Yellow flesh; late............................................. 05
6814 Osage. Cocoanut-shaped, yellow flesh; light green, netted skin............. 05 o5 $\begin{array}{llllllllll} & 15 & 35 & 1 & 25\end{array}$
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

SALMON-FLESHED MUSKMELONS, continued


GREEN-FLESHED VARIETIES


THORBURN'S LONG ISLAND BEAUTY MUSKMELON

6940 Jenny Lind. Old favorite. Sma11, green-fleshed; very early; good quality. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb}$. 35 c . ib, \$1.
6950 Long Island Beauty. On style of Hackensack. The earliest and finest in quality, and the most beautiful of all Muskmelons. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb}$. 35 cts., lb. \$1.25.
6970 Montreal, Green. Large, round, netted; flesh thick and light green; late. Pkt. 5 cts., oz. I5 cts., $1 / 4 \mathrm{lb}$. 35 cts ., lb. $\$ 1.25$.
6980 Netted Gem, Round. Very early; small and of fine flavor; green flesh. Pkt. 5 cts ., oz. Io cts., $1 / 4 \mathrm{lb}$. $30 \mathrm{cts} ., \mathrm{lb}$. $\$ \mathrm{I}$.
6990 Netted Gem, Oblong. Same as above, save in shape. Pkt. 5 cts., oz. Io cts., 1/41b. 30 cts ., lb. \$1.
6994 Norfolk Button. On style of Jenny Lind; good flavor. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. 30 cts., 1b. \$1.
7000 Nutmeg. Sweet, green flesh; very early; named from its shape. Pkt. 5 cts., oz. io cts., $1 / 4 \mathrm{lb}$. 30 cts ., lb. \$I.
7010 Rocky Ford. Improved Netted Gem; very sweet and fine-flavored; oblong. Pkt. 5 cts., oz. Io cts., $1 / 41 \mathrm{~b}$. 30 cts ., lb. \$1.
7030 Skilman's Netted Gem. Oval shape; early; sweet and highly perfumed; green flesh. Pkt. 5 cts., oz. 15 cts., $1 / 4 \mathrm{lb}$. 35 cts., 1b. \$1.25.

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound
MISCELLANEOUS MUSKMELONS
 7120 Mango Melon, or Vine Orange. Size, shape and color of an orange; fine for preserving or for pickling................................................. 05 . 20 . 60200 7130 Pomegranate. Ornamental for perfume; late................................ $05 \quad 20 \quad 60 \quad 200$ 7140 Winter Pineapple. An extraordinary melon; can be kept in splendid con- dition for months after being pulled. For the South only.................. $05 \quad 20 \quad 60 \quad 200$
IMPORTED VARIETIES OF MUSKMELON
ENGLISH FRAME VARIETIES ..... Pkt.
7220 Eclipse. Green flesh ..... \$O 25
7230 Blenheim Orange. Scarlet flesh. ..... 25
7250 Monroe's Little Heath. Scarlet flesh. ..... 25
7270 Gunton Scarlet. ..... 25
7280 Royal Sovereign. White flesh. ..... 25
7290 Windsor Castle. Green flesh. ..... 25
FRENCH VARIETIESThese sorts ripen outdoors here, and are well worthy of cultivation
7300 Delight of the Table ..... 25
7310 Trevoux. ..... 25
7320 Noir des Carmes ..... 25
7330 Tours Sugar ..... 25These are four of the latest Paris market sorts.
MELON, WATER
Melon d'Eau Zandia Wafjermelome
Culture.-Treat the same as Muskmelon, except that they should be planted 8 or io feet apart, according to variety. Light soil is best.

|  | Alabama Sweet. Dark green skin; red flesh, tender and sweet. Long. Fine <br> shipper. | \$0 |  |  |
| :---: | :---: | :---: | :---: | :---: |
| 7430 | Black Diamond. Dark green, tough skin; large size. Round. . . . . . . . . . . . . 05 | 10 | 25 | 75 |
| 7440 | Black Spanish. Roundish; nearly black; dark red flesh; early............. . . 05 |  | 25 | 5 |
| 7450 | Boss. Oblong; dark green; flesh deep scarlet; rind thin; intermediate ...... . 05 |  | 25 | 75 |
| 7460 | Blue Gem, or Iceberg. Bright red flesh; very sweet; fine shipper. Oval..... 05 | IO | 25 | 75 |
| 7480 | Bradford. Long and of dark color; red flesh, sweet and tender............. . 05 | IO | 25 | 75 |
| 7490 | Cole's Early. Medium size; red flesh; green skin. Oval. . . . . . . . . . . . . . . . 05 | IO | 25 | 5 |
| 7500 | Cuban Queen. Solid and heavy; skin marked regularly; excellent; early. Oval. 05 | 10 | 25 | 75 |
| 7510 | Dixie. Excellent quality; very large and solid; red flesh; intermediate. Long of | IO | 25 | 75 |
| 7530 | Early Fordhook. Extra-early; good size; green skin; red flesh. Oval. . . . . . . 05 | IO | 25 | 75 |
| 7540 | Florida Favorite. A superior strain; oblong; red flesh; intermediate. . . . . . . . 05 | IO | 25 | 75 |
|  | Halbert Honey. Dark, glossy, green skin; flesh crimson, luscious and sweet. Strong, vigorous grower and free fruiter. Long.\|Fine for Northern States. 05 | IO | 25 | 75 |

7560 Hungarian Honey. A very early sort; fine for northern latitudes; perfectly round; brilliant red flesh$\begin{array}{lllll}05 & 10 & 30 & 1 & 00\end{array}$
7570 Ice Cream, White Seed (Peerless). Very early; red flesh. Oval ............. 05 ..... IO ..... 75
7580 Icing, Dark. Solid, dark green skin; red flesh of superior quality; white seed;
7580 Icing, Dark. Solid, dark green skin; red flesh of superior quality; white seed; early; nearly round$\begin{array}{llll}05 & \text { 10 } & 25 & 75 \\ 05 & \text { 10 } & 25 & 75\end{array}$
7590 Icing, Light. Round; pink flesh of fine quality ..... 75
75
7600 Jordan Gray Monarch. Largest grown; crimson flesh; late. Long. ........... shape; striped light and dark green ..... $\begin{array}{llll}05 & 10 & 25 & 75\end{array}$
7610 Kleckley Sweets. Exceedingly sweet and fine-flavored; dark green skin; thin rind; flesh scarlet, solid and firm. Long. ..... 05
75
75
7620 Kolb Gem. Large; good shipper; bright red flesh; intermediate. Oval. . . . . . o5 ..... 05
7630 Mammoth Ironclad. Long; very large; late; red flesh; good shipper. ..... 05 ..... $\begin{array}{lll}\text { IO } & 25 & 75 \\ \text { IO } & 25 & 75\end{array}$
7640 Mammoth Santiago. Light green skin, striped dark green; deep blood-red flesh of sweet flavor; uniformly large and long; a good shipper. ..... 05 ..... IO 25 ..... 75
7650 Mountain Sweet. Red flesh; late. Dark green. Long, tapers to stem end... 05 7660 Phinney. Early, and of fine quality; large, solid; red flesh; intermediate. ..... $\begin{array}{ll}\text { IO } & 25 \\ \end{array}$Oblong05
7670 Pride of Georgia. Round, large; crisp; bright red flesh; intermediate. ..... 05
7680 Rattlesnake, Southern. Oblong; dark and striped; bright red flesh; late.
05
05
7690 Seminole. Very large; quality first-rate; red flesh; intermediate. Oblong. . ..... 05IO257575


TOM WATSON WATERMELON

MELON, WATER, continued


## NASTURTIUM

## Capucine Maraneula $\mathfrak{R a}$ asturtium

Culture.- Sow as soon as all danger of frost is past, in drills about an inch deep. The tall kinds require fences or poles on which to climb. The seeds are used in flavoring pickles, or as a substitute for capers.
1/4b. Lb.

7900 Tall Crimson. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . \$0 o5 \$o i5 \$0 40
7910 Tall Yellow. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . o5 on $_{\text {I5 }} 40$
7920 Tall Mixed. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 05 10 20 10 $\$ 060$
7930 Dwarf Mixed. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 05 10 25 10 75

## OKRA, or GUMBO

Gombaud
Quimbombo
Safran
Culture.-Sow late in the spring, after the ground has become warm, in drills 3 feet apart, where the plants are to remain. Thin out to from 9 to 12 inches. They should be well manured. They may also be raised in pots or a hotbed, and transplanted. For keeping, they should be picked whilst small and tender.
Pkt. Oz. 1/41b. Lb.

8020 Long Green. Tall; very productive; moderately long green pods. . . . . . . \$0 o5 \$0 10 \$0 20 \$0 50
8030 White Velvet. Tender long white pods; smooth and velvety in appearance. . 05 Io $20 \quad 50$
8040 Dwarf Green Prolific. Short thick pod..................................... 05 . 10 . 2050
8050 Perkin's Mammoth. Fine strain; very long pods............................ . 05 Io 20 50

## ORACH, or FRENCH SPINACH

## Arroche Armuella

Culture.-Sow early in spring; cultivate and use like spinach.
Pkt. Oz. 1/11b. Lb. 8100 Red. Distinct; dark red leaves \$0 o5 \$0 i5 \$0 35 \$I oo

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

[^1]
## MUSHROOM SPAWN

Blanc de Champignon<br>Seta<br>©ham >ignonbrut

Culture.-Mushrooms may be grown in cellars, under benches of greenhouses, or in sheds, wherever the temperature of 50 degrees can be kept up through the winter. The beds should be made from November to February, according to the time the Mushrooms are wanted, and it requires about two months for them to begin bearing. Secure fresh horse-manure, free from straw and litter, and mix an equal bulk of loam from an old pasture with it. Keep this under cover, taking care to turn it every day to prevent heating, until the pile is large enough to make a bed the required size. Three to 4 feet wide, 8 inches deep and any length desired are the proper proportions for a bed, but these may be varied. Prepare the mixture of loam and manure, making the bed in layers, and pounding down each with the back of the spade. Leave this to heat through for a few days, and as soon as the heat subsides to 90 degrees, make holes in the bed about a foot apart each way, into which put pieces of the spawn 2 or 3 inches in diameter; fill up the holes with the compost, and at the expiration of a week or ten days the spawn will have thoroughly diffused itself through the bed. Spread a layer of fresh soil over the heap to the depth of 2 inches and cover with 3 or 4 inches of hay, straw or litter. Examine the bed often to see that it does not get dry. Take special care, however, when water is given, that it be at a temperature of about 100 degrees.

From our experience with English, French and American Spawn, we find there is an important difference between them. If the manure in the bed is in proper condition, the French Spawn will take hold and grow fully as well as the other two; but, if the bed is not in the right state, it will often rot. The American and English Spawn, on the contrary, after starting a little, will remain in a comparatively dormant state for a long time without losing its vitality. It is well to keep these points in mind in ordering spawn. The French Spawn should be slightly moistened by sprinkling with water for two or three days before planting.


MUSHROOMS FROM ENGLISH SPAWN

|  | Per brick | Io bricks | Ioo brick |
| :---: | :---: | :---: | :---: |
| 8170 American Spawn. In bricks. | \$0 19 | \$I 60 | \$12 50 |
| 8190 English Spawn. In bricks | 15 | I 00 | 900 |

8190 English Spawn. In bricks Per lb. 30 cts., Io lbs. \$2.50 Transportation charges extra

## MARTYNIA (For Pickles)

Gemsenborn
Culture.-Sow in May in the open ground, 3 feet apart in each direction, where the plants are to remain; or the seed may be sown in a hotbed, and the seedlings afterward transplanted. These varieties are productive and fine for pickles. Pick when small and tender, and preserve the same as cucumbers.

| Pkt. | Oz . | 1/4lb. | Lb. |
| :---: | :---: | :---: | :---: |
| \$0 05 | \$0 25 | \$0 75 | \$2 $5^{0}$ |
| 05 | 25 | 75 |  |

## ONION

## Oignon Cebolla 3wiebel

Culture.-Sow in rich, sandy soil, in drills I foot apart, as soon as the ground can be worked in spring-at the rate of 4 to 5 lbs. to the acre. Thin to 3 or 4 inches, using the rake and hoe frequently to keep down the weeds. The finest Onions are produced by the new method of sowing the seed in hotbed in February and March and transplanting the seedlings to the open ground.
8320 White Early Barletta. A small white Italian sort; earliest.
Pkt. Oz. 1/4lb. Lb.

8340
". Pearl. Extra-early; round; white; fine.

8360 " Large Portugal. The standard large flat sort of the New York markets............................................................ 05
8380 "" Mammoth Garganus, or Silver King. Large, silvery white Italian.... Io 10
05 $20 \quad 60 \quad 200$


75
8420 " Tripoli (El Paso, or Mexican). Large, white Italian variety ......... 05
8430 " Bunching, or Italian Silverskin.
05

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


THORBURN'S GLOBE SOUTHPORT ONIONS
ONION, continued
8450 WHITE VAUGIRARD WINTER. Fine pickling sort. Sow in September Pkt. Oz. $1 \frac{1}{4} \mathrm{lb}$. Lb.


## ONION SETS

Plant in drills about 12 inches apart and 4 inches in the rows. They must have high culture.
These are the prices ruling in January; later on they may be higher

Red Onion Sets.
20

## PEAS

## Pois <br> Chicharos o Guisantes

とrbธิen
CULTURE.-A week may be gained in earliness by sowing a quantity in moist sand placed in a box in the cellar, and planting outside when well sprouted. Light, dry soil, not over rich, suits the Pea. Sow as early as the ground can be worked, and again every ten days for succession. Peas may be sown in this vicinity as late as the 2oth of August. Medium and late Peas must be planted early; Extra-Earlies may be planted again in August. Sow in single or double rows, from 4 to 6 feet apart, according to the different heights, about an inch apart in the row (except such sorts as we note to sow thinly) and 4 inches deep. In this climate, the O'Rourke Pea, if planted from the Ioth to the last of August, will produce a fair crop for fall picking, when Peas will be most acceptable. Hoe often and keep the ground clean and fine. The tall sorts can be made to bear more freely by pinching in. The dwarf varieties may be grown in beds like bush beans, with rows about the same distance apart. The holes which are sometimes found in Peas are caused by the Pea weevil (Bruchus pisi). The beetles lay their eggs on the young pods, and the larvæ, as soon as hatched, make their way through the pods and into the nearest Peas. If the new aphide attacks the Peas. spray the vines every day with clear water of the same temperature as the atmosphere.

Those marked with a star ${ }^{*}$ ) are wrinkled marrows, and, unless otherwise stated, should be sown thicker than the round Peas, and not until the ground has become warm, as they are more liable to rot. They are the finestflavered of all-Peas. Those marked thus ( $\dagger$ ) are large-podded sorts.
We supply packets of Peas at 10 cts. each, postpaid, except where quoted otherwise; other quantities NOT prepaid; add transportation charges at the rate of 5 cts . per pint, 10 cts . per quart.

## 

 8900 Thorburn Extra-Early Market. Our standard market-garden extra-early Pea; productive and profitable to grow............ 28910 Daniel O'Rourke, Improved. Extra-early; favorite sort
8920 First-of-All. First-class selected strain of extra-earlies
8930 Alsta.
$8940 \dagger^{*}$ Thomas Laxton. A cross between Gradus and one of the extraearly sorts. Ripens within a day or two of the earliest round varieties; very productive. The pods are large and contain 7 or 8 large, wrinkled Peas of the finest flavor. pkt. $15 \mathrm{cts...}$.
$30 \quad 50 \quad 1 \quad 75 \quad 300$
$8950 \dagger^{*}$ Gradus, also called Prosperity. One of the finest extra-early Peas. Ready to pick about four days after 8900 . Pods very large, filled with large, wrinkled Peas of finest quality. pkt. 15 cts... 3 3 $\begin{array}{llllllll} & 30 & 50 & \text { I } & 75 & 3 & \text { oo }\end{array}$
8970 Ameer (Claudit). Finest quality; exceedingly productive............ . 2
8980 *American Wonder. Early and productive; fine quality.............. . .
8986 *English Wonder. Very prolific and early ............................. . . $11 /$ $11 / 2$ 20

8990 *Sutton's Excelsior. As early as American Wonder, with much broader 20

| 35 | 1 | 25 | 2 | 00 |
| :--- | :--- | :--- | :--- | :--- |
| 35 | 1 | 25 | 2 | 0 |

$$
\begin{aligned}
& \text { pods, filled with large Peas of finest flavor; very prolific...... I } \\
& \text {,'s Excelsior. Solendid early wrinkled sort: very prolific. }
\end{aligned}
$$

9000 *Nott's Excelsior. Splendid early wrinkled sort; very prolific....... I
9004 Pedigree Extra-Early. One of the finest extra-early sorts.......... 2
9004 Pedigree Extra-Early. One of the finest extra-early sorts.............. 2
9020 *Little Gem. Early; straight pods...
I $1 / 2$
1/2

9030 *Little Marvel. A few days earlier than English Wonder and with larger pods. This variety is an improvement on English
Wonder and in habit is very similar. Remarkably prolific.... 2
$25 \quad 45$ 1 $50 \quad 250$
$9040 \dagger^{*}$ Laxtonian Very large, dark green, curved pods and Peas of finest flavor; great yielder; very early............................... $11 / 2$
9060 *PETER PAN. See Novelties..............................pkt. $25 \mathrm{cts..}$. I $1 / 2$
$9080 \dagger^{*}$ Witham Wonder. A valuable and reliable early dwarf sort. Pods contain 8 to Io large Peas of exceptionally sweet flavor.

## EARLY AND MEDIUM PEAS




## MAIN- AND LATE-CROP PEAS



We supply packets of Peas at 10 cts. each, postpaid.
SUGAR PEAS (EDIBLE PODS)


## PEPPER

Piment
Culture. - Sow in hetbe in Mart when the soil has become warm, set in rows 2 feet apart and 18 inches in the rows; hoe frequently. The plants may also be forwarded in small pots.
9650 Bell, Large. Large; bright red; largely used for pickling. It is of such mild flavor that it may be eaten as a vegetable. Pkt. 5 cts., oz. $20 \mathrm{cts} ., 1 / 4 \mathrm{lb}$. 60 cts., lb. \$2.
9660 CHINESE GIANT. Very large; flesh very mild and thick; bright scarlet color. See Novelties. Pkt. 10 cts., oz. 40 cts., $1 / 4 \mathrm{lb}$. \$I. 25, lb. \$4.
9670 Cayenne Long Red. Bright red slender pods, 3 inches long; pungent. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb}$. 60 cts., lb. \$2.
9680 Celestial. At first fruit is yellow, but when fully matured, a deep scarlet. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb} .65$ cts., lb. $\$ 2.25$.
9700 Golden Queen Mammoth. Very large fruits; rich golden yellow color; early. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb} .65 \mathrm{cts}$., lb. $\$ 2.25$.
9710 Monstrous. Very large and of mild flavor; for use when green. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb} .60 \mathrm{cts} ., \mathrm{lb} . \$ 2$.
9720 Neapolitan. Very early and productive. Large and sweet. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb} .65 \mathrm{cts} ., \mathrm{lb} . \$ 2.25$.
9750 Red Chili. Very productive; very small; red and very pungent. Pkt. 5 cts., oz. 20 cts., $1 / 4 \mathrm{lb} .60 \mathrm{cts} ., \mathrm{lb} . \$ 2$.
9760 Red Cluster. A new type of Chili, with upright, bright red fruits.
Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb .
9764 RUBY GIANT. Quite large and of desirable shape for stuffing
Su 05 So 20 \$0 $65 \$ 25$
and delicate flavor See Novelties.
9770 Ret for stufing
9780 Squ Kir. Brigh 40
9780 Squash, Large. Productive; for pickles.
9790 Sweet Mountain. Large size; regular, handsome shape; mild flavor.
9800 Sweet Spanish. Large, mild; used for salad
$\begin{array}{llll}05 & 30 & 85 & 300\end{array}$

9810 Tabasco. True. Bush 3 feet high; small, long, bright red fruit in clusters;
very hot and the best for pepper-sauce and pickling...................
9840 UPRIGHT SWEET SALAD. Finest of all. See Novelties..
$\begin{array}{llllll}\text { IO } & 45 & \text { I } & 35 & 4 & 50\end{array}$
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


THORBURN EXTRA CURLED PARSLEY

## PARSLEY

## Persil Perijil æeterfitie

Culture.-Soak the seeds a few hours in lukewarm water, and sow early in spring and until the middle of July, in drills I foot apart. Have the soil thoroughly pulverized, and, after sowing the seed, pat it down lightly with the spade. Thin out the plants to 4 inches. To preserve in winter, transplant to a light cellar or coldframe. No. 9970 should be thinned out while young, and managed in after-cultivation the same as carrots and parsnips. The roots are edible either raw or cooked.


## PARSNIP

## Panais Chirijia ßaßtinafe

Culture.-Sow as early in the spring as the ground can be worked, in rich soil, in drills 18 inches apart. The ground should be well and deeply dug. Thin to 6 or 8 inches in the rows. Hoe and cultivate often to keep down weeds. $\quad$ Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb.

## 10030 Thorburn Hollow Crown. A

 market-gardener's strain.....\$0 o5 \$0 10 \$0 20 \$0 70 10050 Early Round...................... . o5 15 3590
# PUMPKIN 

## Potiron Calabaza ©roß̄e $\mathfrak{K u ̈ r b i ̄ ̄ ~}$

Culture.-May be planted middle of spring, among the Indian corn or in the field or garden, in hills 8 or Io feet apart each way, four seeds in a hill. In other respects is cultivated in same manner as melons and cucumbers. Avoid planting near other vines.

|  | Pkt. | Oz . | 1/4lb. |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Large Cheese. Flat; one of the best varieties for family use............\$0 05 |  |  |  |
| 10160 | Kentucky. Flat; fine for pies, etc....... . . . . . . . . . . . . . . . . . 05 | 10 | 20 | 50 |
| 10170 | Early Sugar. Fine-grained, sweet and prolific; small; yellow. . . . . . . . . . . . . 05 | 10 | 20 | 50 |
| 10200 | Golden Oblong. Orange skin; light yellow flesh; fine quality; good keeper. 05 | 10 | 20 | 65 |
| 10210 | Cushaw Golden. Fine yellow crookneck sort. . . . . . . . . . . . . . . . . . . . . . . . . . 05 | 10 | 25 | 75 |
| 10220 | Striped. A splendid striped crookneck variety . . . . . . . . . . . . . . . . os | 10 | 25 | 75 |
| 10224 | White, or Jonathan. A white crookneck variety of excellent quality; fine for pies. | 10 | 25 | 75 |
| 330 | Tennessee Sweet Potato. Bell-shaped; thick, white flesh; fine for pies..... 05 | 10 | 25 | 75 |
| 10244 | Japan Crookneck. Fine keeper. Quality excellent...... . . . . . . . . . . . . . . . . 05 | 10 | 25 | 75 |
| 10250 | Red Etampes. Medium size; flat; very productive....... . . . . . . . . . . . . . . . . 05 | 15 | 40 | 25 |
| 10260 | Mammoth King. Grows to an enormous size. . . . . . . . . . . . . . . . . . . . . . . . . 05 | 15 | 40 | 25 |
| 10270 | Mammoth Tours. A very large French variety. . . . . . . . . . . . . . . . . . . . . . . 05 | 10 | 25 | 75 |
| 10280 | Quaker Pie. Very prolific and a good keeper; fine for pies................ . 05 | 10 | 25 | 75 |
| 10290 | Winter Luxury. A fine keeper and one of the best for pies.............. . 05 | 10 | 25 | 75 |
| 10300 | Connecticut Field. Grown in corn-fields for stock. .......1/2lb. 25 cts... 05 | 10 | 15 | 40 |

## SEED POTATOES GROWN EXPRESSLY FOR SEED

## Pomme de Terre Patatas $\mathfrak{R} a r t o f f e \mathfrak{n}$

Culture.-Three to four barrels to the acre: In order to have the best success in growing Potatoes, it is necessary to plant as early as the ground can be made ready. Select a rich soil, and plant in rows 3 feet apart, and the sets I foot in the rows. If wood-ashes and plaster can be procured, sow a good dressing over the field after the Potatoes are up. If a very early crop is desired, it will be necessary to sprout the Potatoes before planting. Cut the Potatoes into pieces of any size desirable, and place in a warm, light room for four to six weeks before required for planting in the open ground. During this time shoots will start out strong and vigorous, so that, as soon as planted, they will send out roots and grow much more rapidly than those treated in the ordinary way. Another method is to place the sets in a hotbed two weeks before they are wanted, and then lift carefully and set out on fresh horse-dung, so that the heat will cause them to start at once. If the Colorado Potato-beetle makes its appearance, the vines must be dusted with paris green mixed with about 80 parts of plaster; or what is better, mix the paris green in water, one small tablespoonful to a pailful, and apply with a small brush or broom. Take care to stir the mixture often, or else the paris green will settle to the bottom. Two or three applications during the season will usually suffice to clean off all the beetles.

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## EARLY POTATOES

|  | AUTY. The finest and most pr ndsomer in appearance and mo Its table quality is superb. O |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | The Thorburn. We recommend it as one of the best for first crop. It is very early and of the finest quality; also very productive and of good size and form. |  |  |  |
| 10420 | horburn's Beauty of Hebron. Slightly flesh-colored skin, with pure white flesh. Very productive and of the finest quality; a first-class early variety |  |  |  |
| 10430 | Irish Cobbler. Fine white; vigorous grower | 65 | 200 |  |
| 10 | Bovee. Extra early; very productive; of fine quality; flesh |  | 200 |  |
| 10460 | Early Rose. Popular market sort; very early; fine quality; very productive. $4^{\circ}$ |  |  |  |
|  | Bliss' Triumph. Very early and very productive; handsome color; resists disease well. Good sort for the South |  |  |  |

## INTERMEDIATE AND LATE POTATOES

10520 Gold Coin. A splendid main-crop variety of remarkable productiveness and finest table quality; slightly oblong form, light golden skin; flesh pure white, fine-grained; cooks very dry.................................. . . . .
10530 Carman No. 1. This most valuable Potato was introduced by us in 1894 , and it is a recognized high-class standard sort the world over. The finest second-early Potato ever offered.
$40 \quad 65 \quad 200 \quad 450$
10540 Uncle Sam. Handsome shape, good size, fine quality . . . . . . . . . . . . . . . . . . .
10560 Sir Walter Raleigh. Very productive; white flesh of best quality.... . . . . . . 40
10580 Rural New Yorker. Very few and shallow eyes; pure white skin and flesh; immense yielder; fine table quality

40
$65 \quad 200475$
$\begin{array}{llll}65 & 200 & 450\end{array}$
10590 Green Mountain. Oval shape, white skin and flesh; excellent; heavy yielder. 40



TYPES OF THORBURN RADISHES

## RADISH

## Radis et Rave

Rabanos y Rabanitos
Rabies und Mettig
Culture.-Sow as soon as the ground is dry in the spring, in rows 8 to $\mathbf{I 2}$ inches apart, every week or ten days for a succession, up to the middle of June, after which they are but little used, unless a cool northern spot can be had, where the ground is shaded during part of the day. They should be sown in light, rich soil, as a crisp Radish cannot be produced in heavy soils. Sow also in early fall for late crops and winter use. Sow 8 to io lbs. to the acre. Radishes should be eaten when quite small; it is a mistake to let them grow too long and too large. This applies particularly to the French Breakfast and small turnip-shaped sorts.

Varieties marked with an asterisk (*) are best suited for market-gardeners.
10680*Turnip, Early Scarlet. Very early. The French favorite.
 10690* " Early Scarlet Forcing. Crisp; very early. \$o o5 \$0 10 \$0 20 \$0 50 $\begin{array}{lll}10710^{*} & " & \text { Early Scarlet White-tipped. Very early; for frames or outdoors . . . . . . } 05 \\ \text { 10720 } & \text { " } & \text { " }\end{array}$ 10720 " " Forcing.................................... $0^{0}$
10740 " " Deep Scarlet. Very early; crisp................................. . . . 05
10760 " " DEEP SCARLET FORCING. See Novelties.................. 05
10764 " " Deep Blood-Red. Fine deep color................................ 0
10770* " " Scarlet Gem, White-tipped Forcing................................ 0
10800 " " Triumph (Speckled Beauty). Very prettily striped or mottled scarlet and white; fine forcer.............................. . .
10810* " " SCARLET GLOBE-SHAPED. Fine for forcing or open ground. See Novelties.

05
10820 " " CRIMSON GIANT, or Giant Butter. See Novelties........... 05
10840* " " Non Plus Ultra. Extra-early scarlet forcing. ................ . . 05
10860 " " White, or Box. For forcing; flesh pure white and sweet...... 05 5 $10 \therefore 20 \quad 60$

10870 " Sparkler. Half brilliant scarlet, half white; short-leaved. Excellent variety

05
5

| 10 | 20 | 75 |
| :--- | :--- | :--- |
| 10 | 20 | 50 |

10900* " Golden Summer. Smooth and bright skin..................................................................... $0_{5}$
$11000^{*}$ French Breakfast. Pink and white; early..................................... 05
11060*Olive-shaped White Forcing (White Rocket). A forcing strain of above..... 05
5

11080* " Deep Scarlet Forcing (Red Rocket). A forcing strain of the above.

05
$10 \quad 25 \quad 7$


We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


## RAMPION

## Ratponce Reponche: $\quad$ Rapurzel= $=$ Rübe

Culture.-Sow in the open ground early in May, either broadcast or in drills io inches apart. As the seed is very fine, it merely requires to be pressed firmly into the soil. Thin out the seedlings if they come out too thickly, and water frequently during hot weather. The roots may be gathered for use from October onward throughout the winter.

Pkt. Oz. $\quad$ /4b. Lb. 11550 Rampion. The roots and leaves are excellent as salad....................... 10 \$0 25 \$0 $75 \$ 2 \quad 50$

## 11590 ROQUETTE

Culture.-Sow early in spring, in rows, and thin out to 8 to 10 inches. If kept well scuffled and watered, the tart flavor of the leaves is greatly diminished. This flavor is not pronounced in the small leaves, which are used for salad. The flowers, appearing from May to June, have very much the odor of orange blossoms. Pkt. $5 \mathrm{cts} .$, oz. 15 cts., $1 / 4 \mathrm{lb} .35 \mathrm{cts} ., \mathrm{lb} . \$ \mathrm{I}$.

## RHUBARB

Culture.-Sow seed in a coldframe, in a fine, rich, sandy loam, about the first of March, in drills 4 inches apart. Keep the frames covered during nights and cold days, so that the soil will not freeze, and in six to eight weeks the plants will be large enough to set in the open ground. Transplant to a rich soil, and set in rows 12 inches apart and 12 inches in the row. The following spring transplant again to a permanent location, setting 4 to 5 feet apart each way. In good soil, Rhubarb is ready to use the second year from seed. When roots are set out, plant them 4 to 5 feet apart each way, and keep weeds down. If roots are used, a crop may be had after one season, which is much better than sowing seed where only a few plants for family use are needed. In the fall, the bed should have a thick dressing of coarse manure, to be spaded under in spring.

\$o 05 \$0 I5 \$0 40 \$I 25
11700 ROOTS, of Victoria only. Strong. is cts. each, \$I.50 per doz. Transportation charges extra.

## 11740 SCOLYMUS

The roots resemble a small parsnip, and will keep through the winter like a turnip. It is cultivated exactly like the carrot, except that it should be grown in rows 3 feet apart and 18 inches in the rows. It is eaten boiled like salsify. Pkt. Io cts., oz. 25 cts., $1 / 41 \mathrm{~b}$. 75 cts., lb. $\$ 2.50$.

## 11780 SCORZONERA

## Corzonere Escorzonera - Scorziontwurzel

Culture.-Cultivate the same as salsify. It is cooked in the same manner, but, on account of being somewhat more difficult to raise, is seldom seen in cultivation. Considered by many superior to salsify. It is also called Black Salsify. Pkt. ro cts., oz. 25 cts., $1 / 4 \mathrm{lb}$. 75 cts., 1 b . $\$ 2.50$.

## SALSIFY, or VEGETABLE OYSTER

Salsifis Ostion Vegetal Saferwurzel

Culture.-Sow as early as the ground can be worked in the spring, in drills 12 inches apart, I inch deep, and thin out to 6 inches in the row. Keep them free from weeds. Cultivate the same as carrots and parsnips. A part of the crop may be left in the ground till spring, when it will be found fresh and plump. The roots are cut into pieces $1 / 2$ inch long, boiled until tender, and then served with drawn butter, in which way it is a delicious vegetable. They are also mashed and baked like parsnips, and have a sweet and agreeable flavor. Mashed and fried, the flavor is much like that of the oyster. Sow eight to ten pounds to the acre.
11850 Mammoth Sandwich Island. Large. Pkt. 5 cts., oz. I 5 cts., $1 / 4 \mathrm{lb} .40 \mathrm{cts} ., \mathrm{lb} . \$ \mathrm{I} .25$.
11880 Thorburn's Improved Thick-rooted. Thick and smooth. Pkt. IO cts., oz. 30 cts., $1 / 4 \mathrm{lb}$. 85 cts., lb. \$3.

SKIRRET. See page 50.

## SORREL

## Oseille Acedera Sauerampfer

Culture.-Sow in spring in drills 18 inches apart, in a rich soil, and keep the flower-stems cut off as they appear. It remains in the ground year after year, and needs to be taken up and divided only once in four or five years. To be cut and cooked precisely like spinach; or it is excellent cooked with it, one-third Sorrel to twothirds spinach. It is also used for soups. Very nice to be eaten after it has become cool. Inasmuch as the hot sun tends to increase its acidity, a northern exposure is preferable.
11930 Garden, Large French. Pkt. 5 cts., oz. $20 \mathrm{cts} ., 1 / 4 \mathrm{lb} .60 \mathrm{cts} ., \mathrm{lb} . \$ 2$.
11934 " Large Belleville. Very large


THORBURN'S IMPROVED THICK-ROOTED SALSIFY
.... . \$0 10 \$0 30 \$0 85 \$3 00
11940 "، Mammoth Lyons. Extra-large improved strain ................. 10 . $30 \quad 85$. 300


## SPINACH

## Epinard Espinaca Spinat

Culture.-Sow in early spring, in drills a foot apart (io to 12 lbs. to the acre), every two weeks for a succession, and, as it grows, thin out for use. For fall use, sow in August, and for winter crop in September. Cover that which is left out over winter with straw or leaves


GIANT LUCULLUS SWISS CHARD (see page 47) after the weather becomes quite cold. Keep clear of weeds, Sow the seeds of New Zealand in hills 2 feet apart each way, three or four seeds in a hill. 12000 Round Viroflay (Thick-leaved). Has very large, thick, dark green leaves; the favorite market-gardeners' sort for fall or spring sowing. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. I 5 cts., lb. 35 cts.
12010 Long Season, Thorburn's. Stands longer before running to seed than any other sort except New Zealand. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. 15 cts., lb. 35 cts.
12020 Round-leaved Flanders. A standard sort. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. I 5 cts., lb. 35 cts.
12040 Lettuce-leaved. Popular French sort. Pkt. 5 cts., oz. Io cts., $1 / 4 \mathrm{lb}$. I5 cts., lb. 35 cts.
12050 Curled-leaved Savoy, or Bloomsdale. Large curled and wrinkled leaves; tender and of finest flavor. Pkt. 5 cts., oz. IO cts., $1 / 4 \mathrm{lb}$. 15 cts., lb. 35 cts.
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## SPINACH, continued

Pkt. Oz. 5/4lb. Lb. 12060 Long-standing (Round Thick-leaved). Dark green; leaves large and thick; very long-standing. Best for spring growing.................\$0 12070 Victoria. Extra-dark, black-green color. Two or three weeks later than the ordinary "Long-standing." A fine variety for spring sowing....... on $^{2}$ Io $15 \quad 35$
12080 Prickly, or Winter. Vigorous and hardy; recommended for fall sowing..... o5 io 15 in 35
12090 Eskimo Giant. Dark green; large leaves.................................... . . 05
12100 Triumph. An improved long-standing sort. hot climates. Soak the seed in hot water before using.hot climates. Soak the seed in hot water before using

## 1690 SWISS CHARD, or SILVER BEET

This is a Beet producing leaves only, of a quality superior to those of the ordinary Beet, and excellent as greens. Cultivate about the same as spinach, by sowing the seed in early spring, in drills about a foot apart. As it grows, thin out for use, and keep clear of weeds if success is desired. Good cultivation will greatly increase the delicacy and tenderness of the leaves. Pkt. 5 cts ., oz. Io cts., $1 / 4 \mathrm{lb} .35 \mathrm{cts} ., \mathrm{lb}$. \$I. Pkt. Oz. $1 / 4 \mathrm{lb}$. Lb. 1700 Giant Lucullus. Large, crinkled leaves; tender and of fine flavor. . . . . . . . \$0 o5 \$0 I5 \$0 50 \$I 50


THORBURN'S EARLY wHITE SCALLOP BUSH SQUASH

## SQUASH

## Courge

Calabaza
ভpeizెe ঞürbiß
Culture.-Sow in hills in the same manner and at the same time as cucumbers and melons, the bush varieties 3 to 4 feet apart, the running kinds from 6 to 9 feet apart.

## BUSH VARIETIES

12200 Early Golden Bush. Fine for summer; not so early as the White Bush Pkt. 12210 Golden Custard. Mammoth strain of the Golden Bush. A valuable va-
riety; golden yellow flesh; fine quality............................... o $_{5}$ 1o 25 80
12220 Early White Scallop Bush. A good early shipping variety................ os os io $25 \quad 75$
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound
larger fruits. 12230 Long Island White Bush. An improved strain of Early White Scallop 12230 Long Island White Bush. An improved strain of Early White Scallop

BUSH SQUASH, continued
12224 Mammoth White Scallop Bush. Not so early as the former but it produces
Pkt. Oz. I/4lb. Lb.

|  | Bush; very proiific......... . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 05 | 10 | 25 | 75 |
| :---: | :---: | :---: | :---: | :---: |
| 12250 | Silver Custard. A mammoth strain of Early White Bush. Very large..... 05 | 10 | 25 | 75 |
| 12270 | Summer Crookneck. Yellow fruit; distinct, best for summer.............. 05 | 10 | 25 | 75 |
| 12280 | Giant Summer Crookneck. Double the size of the above................ 05 | 10 | 25 | 80 |
| 12300 | Cocozell Bush. A fine variety; oblong shape; skin smooth; dark green, marbled yellow or pale green. | 15 | 35 | 100 |

## RUNNING VARIETIES

| Bay State. Hard, blue shell; for fall or winter......... . . . . . . . . . . . . . . . . . 05 | 15 | 40 | 1 | 25 |
| :---: | :---: | :---: | :---: | :---: |
| 12410 Boston Marrow. Oval; bright orange; flesh yellow and fine............... . 05 | 0 | 30 | I | 0 |
| 40 Delicata. Orange-yellow, striped green; small size, but very prolific; it is extra early, solid, and a good keeper; flesh dry and of fine quality... 05 | 15 | 40 | 1 | 25 |
| 12450 Delicious. Green skin; orange flesh, fine-grained, sweet and dry ........... o5 | 15 | 40 | I | 25 |
| 12460 Essex Hybrid. A good fall and winter sort; fine-grained; rich flavor; very prolific. | 15 | 40 | I | 25 |
| 12470 Fordhook. One of the best winter sorts; fine quality . . . . . . . . . . . . . . . . . . 05 | 15 | 40 | I | 25 |
| 12490 Golden Bronze. Skin green; flesh yellow, fine-grained and sweet. . . . . . . . . o5 | 15 | 40 | 1 | 25 |
| 12500 Hubbard. Well known and liked for late use; an excellent sort for pies..... 05 | 15 | 40 | 1 | 25 |
| 12510 " Golden. Same as above, but with orange-red skin........... . . 05 | 15 | 40 | 1 | 25 |
| 12520 " Red. Same as Hubbard, but with bright red skin.............. . 05 | I5 | $40^{-}$ | 1 | 25 |
| 12530 " Mammoth Warted. Immense size, covered with warts........ 05 | 15. | 40 | 1 | 25 |
| 12540 Mammoth Chili. Rich orange flesh; grows to an enormous size........... . 05 | 15 | 40 | I | 25 |
| 12550 Mammoth Whale. Enormous size; solid; bright orange flesh of fine quality. 05 | 20 | 50 | I | 50 |
| 12560 Marblehead. Grey skin; very productive; fine keeper................... . . o 05 | 15 | 40 | 1 | 25 |
| 12570 Orange Marrow. Quite distinct; very early, and of most delicate flavor; suitable for fall and winter. | 15 | 40 |  | 25 |
| 12580 Perfect Gem. Round; white; fine quality; good for fall or winter.......... 05 | 20 | 50 | 1 | 50 |

## VEGETABLE MARROW

|  | English. The true English strain; cream color, merging into deep yellow; white flesh; about 9 inches long. $\qquad$ | 15 | 40 | I | 25 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 12700 | Italian (Cocozelle di Napoli). Grows about 20 inches long, with a diameter of 3 or 4 inches. Skin smooth, dark green, marbled yellow or paler green. In Italy it is eaten when quite young. | 15 | 35 | 1 | 00 |

## TOMATO

## Tomato Tomates. ¿ebewapfel

Culture.-Sow in a hotbed in early spring, or the seed may be sown in shallow boxes and placed in a window when one does not wish to have the trouble of making a hotbed. Transplant to the open ground when all danger of frost is past, setting the plants 3 to 4 feet apart each way. Fruit may be had several weeks earlier by sowing seed quite early and transplanting to small pots. Tomatoes that have not ripened at the end of the season may be taken from the vines and placed in empty coldframes, or wrapped in tissue paper, and carefully packed in flat boxes-where a large proportion of them will ripen from time to time, frequently until Christmas.

12740 Acme. Medium size; smooth and good; purplish pink...................... \$0 o5 \$0 25 \$0 75 \$2 50
12750 Atlantic Prize. Extra early; smooth, bright red, good size............... . o5 $25 \quad 75 \quad 250$
12770 Beauty. Large, smooth, dark pinkish red; thick flesh; regular form . . . . . . . o5 $05 \quad 25 \quad 75 \quad 250$
12780 Buckeye State. Very large and productive; smooth, uniform, good quality. $15 \quad 30 \quad 85 \quad 300$
12794 Carter's Sunrise. Early and productive; medium-sized, bright scarlet fruits; smooth and solid. For forcing or for outdoors.................. I5 15 IO I 2540
12800 Chalk's Early Jewel. Fine, large, solid, smooth, bright red; similar to

12804 Comet. Fine, rich scarlet-red; of perfect form. Great producer; finest quality. Forcing or outdoors. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 15 I5 40 I 25400

[^2]

THORBURN'S STONE TOMATO

TOMATO, continued
12810 Coreless, Livingston's. Almost round; bright red; very productive. Pkt. Oz. 1/4lb. Lb. Ripens all over at once and being almost free from green core it is an exceptionally fine slicing sort...
\$0 10 \$0 $30 \$ 085 \$ 3$ oo
12830 Crimson Cushion. Extra large; handsome; bright crimson .................... $10 \quad 30 \quad 85 \quad 300$
12840 Dwarf Champion. Quite distinct; early; fruit like the Acme................ $10 \quad 30 \quad 80 \quad 300$
12844 Dwarf Giant. Largest-fruited of all dwarf sorts. Rich purplish crimson; firm flesh of delicious flavor. Compact and vigorous grower ................ $10 \quad 35$ I oo 350
12850 Earliana. Extra early; bright red; smooth. .................................. . . . 10
12870 Earlibell. One of the earliest and most prolific red sorts; vigorous grower... Io
12880 Enormous. Extra large; very solid; bright red.............................. . . . . 10
12900 Favorite. Large; smooth; productive and a good shipper.................. . . . 05
12910 Fordhook First. Smooth; solid; deep pink; medium size; early.............. . . 05
$85 \quad 3$ oo
$\begin{array}{lll}1 & 00 & 30\end{array}$
I $00 \quad 350$
$75 \quad 250$
$75 \quad 250$
12920 Frogmore Selected. Medium size; bright deep red; smooth; very solid and fine-flavored. An excellent sort for forcing under glass. . . . . . . . . . . 10
12930 Freedom. Early; regular and uniform; bright scarlet. ....................... . . . 05
I 25400
12940 Globe, Livingston's. Glossy rose-color, tinged with purple; very early, smooth and of large size; very productive and a good keeper.......... 10
12950 Golden Queen. Smooth, golden yellow; about size and form of Beauty.... 05
12960 Ignotum. Early for so large a sort; deep red; smooth; very prolific. . . . . . . . 05
12970 Imperial. Early; large; smooth; solid; fine quality; color of Beauty . . . . . . .
12980 June Pink. A very early market sort; smooth and of a bright pink color; medium size.
12990 Lemon Queen, Thorburn's. Skin and flesh lemon with a faint rose blush. o5
13000 Lorillard. Bright glossy red; smooth; of fine flavor and very early........ . . Io
13020 Magnus. Purplish pink, firm flesh; large; uniform; early; productive....... 05
13030 Matchless. Extra large, smooth and handsome; bright red; very solid..... Io
13060 Paragon. Bright red; round; very productive............................... . . . 05
13070 Perfection. Early, regular and productive; reddish scarlet............... . . . . 05
13080 Ponderosa. The largest variety in cultivation.
05


I $00 \quad 350$
$75 \quad 250$
$75 \quad 250$
$75 \quad 250$
$85 \quad 300$
$25 \quad 75 \quad 2 \quad 50$
$30 \quad 85 \quad 300$
$25 \quad 75 \quad 2 \quad 50$
$\begin{array}{llll}30 & 85 & 3 & 00\end{array}$
$\begin{array}{llll}25 & 75 & 2 & 50\end{array}$
$25 \quad 75 \quad 2 \quad 50$
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


THORBURN'S RED CHERRY TOMATOES
TOMATOES, continued
13084 RED ROCK. See Novelties
Pkt. Oz . 1/4lb. Lb.
13110 Ruby Early. Very early; large size color bright scarlet.
13114 Station Dwarf. For pots, .............. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . .
13120 Stirling Castle. Small size; very solid; finest flavor; enormously productive; for forcing under glass

55
0525
$75 \$ 250$

13130 Stone. Very large; perfectly smooth; fine bright scarlet. ....................
$05 \quad 25$
I 25400 ger fruits. Color bright scarlet; perfect shape; very solid and of the best quality.
13170 Table Queen. Large; smooth; round; solid....................................
13180 TERRA-COTTA, THORBURN'S IMPROVED. Distinct in color and flesh; pure terra-cotta. See Novelties.

10
I 00350

13190 Thorburn's Earliest. Smooth; uniform grower; immense yielder. ........... 10

60

13210 Trucker's Favorite. Large, smooth and very regular in form. Purplish red; solid.

## SMALL-FRUITED VARIETIES

For pickling and preserving. Also invaluable for garnishing.


## SKIRRET

## Chervis ふudfermurzel

Culture.-Sow in drills $1 / 2$ inch deep, a foot apart; thin out to 8 inches in the row; keep down the weeds. Take up the roots before winter, and store in sand or earth. It is a plump, fleshy root, containing a quantity of sugar and is eaten like scorzonera or salsify. $\quad \mathrm{Pkt}$.Oz . $1 / 4 \mathrm{lb}$. Lb. 13440 Skirret. \$0 10 \$0 30 \$0 85 \$3 00

WITLOOF. See Chicory, page 27.
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## TURNIP

## Navet Nabo ঞübe

Culture.-For early Turnips, sow as soon as the ground opens in spring. Nos. 13850 to 13890 should be sown from any time in July to first of August; but the other kinds, for winter use, may be sown from the middle of July to the end of August. Turnips are generally sown broadcast, but much larger crops are obtained (particularly of the Rutabagas) by cultivating in drills 18 inches apart, and thinning to 6 inches in the drill. Sow in drills, one pound to the acre; broadcast, two to three pounds to the acre.

## WHITE VARIETIES

|  | Cow Horn. Long white, in shape resembling a cow's horn |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 13510 | Early Snowball. Small, and of rapid growth; pure white | 05 | o | 0 |  |
| 13520 | German Teltow. Smallest of all; early; distinct flavor; best for pickling | 05 | - | 25 | 80 |
| 13530 | Globe-shaped Red-Top. A standard sort in the New York Mar | 05 | ıо |  |  |
| 13540 | Globe, Pomeranian White. Good either for table or stoc | 05 | - | 0 |  |
| 13560 | Half-Long White. For frames or outdoors; tender when young; | 05 | - | 25 |  |
| 13570 | Jersey Lily (White Model). Snow-white; globula | 05 | - | 20 | 60 |
| 13580 | Kashmyr Scarlet. Small; flat; extra early; pure white flesh of finest quality |  | - | 25 |  |
| 13590 | Milan, Early Purple-Crown. Earliest of all; white, with purple top. | 05 |  | 60 |  |
| 13600 | Milan, Early Pure White. Very handsome; pure white; as early as above |  | 20 | 60 |  |
| 13610 | MONTESSON WHITE WINTER. Valuable new sort. See Novelties.. | ı | - |  |  |
| 13620 | Norfolk White. Globular; late; solid. |  | ıо |  |  |
| 13630 | Stone, Thorburn Grey. Solid and sweet; good keeper | o5 | 10 | 25 | 75 |
| 13640 | Strap-Leaf, White. A good early, white, flat sort. | o5 | 10 |  |  |
| 13650 | Strap-Leaf Red-Top. The popular fall flat sort. | 05 | ıо |  | 60 |
| 13680 | White Egg. Oval; handsome and sweet | 05 | ıо | 0 |  |
| 13690 | White French, or Rock. Very productive and a fine keeper | 05 | וо | 20 |  |
| 13710 | White Tankard. Fine keeper; long shape | 05 | 10 | 25 | 75 |

## YELLOW VARIETIES

| 13750 | Aberdeen Yellow. Hardy, productive and a good kee | 05 | 10 | 20 | 60 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 13770 | Globe, Yellow. Fine, sweet, light yellow sort. | 05 | 10 | 25 | 75 |
| 13780 | Golden Ball. Very handsome; keeps fairly well | 05 | 10 | 25 | 75 |
| 13800 | Stone, Thorburn Yellow. Fine, hard winter sort | 05 | 10 | 20 | 60 |
| 13840 | Tankard Yellow. Long-shaped; good keeper; fine quality | 05 | 10 | 20 | 60 |
| RUTABAGA |  |  |  |  |  |
| 13850 | Thorburn Family. A fine strain for family use; finest quality. | 05 | 10 | 25 | 75 |
| 13860 | Thorburn Purple-Top Improved (L. I. strain). | 05 | 10 | 20 | 60 |
| 13864 | Bangholm Swede. Of large size; spherical roots of regular form | O5 | 10 | 20 | 60 |
| 13880 | White-fleshed. Large and productive; of fine quality. | 05 | 10 | 20 | 50 |
| 13890 | Laing's. | 05 | 10 | 20 | 60 |



THORBURN'S RED-TOP, WHITE GLOBE AND STRAP-LEAF TURNIPS
We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound


# Seeds of Pot, Sweet and Medicinal Herbs 

|  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 14010 | Angelica. Garden. For flavoring wine | Archangelica officinalis.. | 05 | 20 |  |
| 14020 | Anise. Seeds aromatic and carminative. | Pimpinella anisum. | 05 | ıо | 75 |
| 14030 | Arnica. Tincture of Arnica is made from it | Arnica montana. | 15 |  |  |
| 14040 | Balm. For culinary purposes. | Melissa officinalis | 05 | 25 |  |
| 14050 | Basil, Sweet. Culinary herb used for flavoring soup | Ocimum Basilicum | ${ }^{\circ}$ | 15 | 50 |
| 14060 | " Dwarf or Bush. Culinary herb | Ocimum minimum | 05 | 15 |  |
| 14070 | Belladonna. Is used for medicine | Atropa Belladonna | 10 | 45 |  |
| 14080 | Bene. The leaves used for dysent | Sesamum orientale | 05 | 10 | 75 |
| 240 | Borage, Leaves used as | Borago officinalis |  | ıо | 90 |
| 14100 | Caraway. For sowing. Used in flavoring li | Carum Carui | 05 | ıо | 60 |
| 14110 | Catnip. Has medicinal qualities | Nepeta cataria | 10 | 35 |  |
| 14120 | Chamomile | Matricaria Chamomilla | 15 |  |  |
| 14130 | Coriander. Seeds aromatic. For sowing | Coriandrum sativum |  | ıо | - |
| 14134 | For flavorin | Coriandum sativum | 05 | 10 |  |
| 14140 | Cumin | Cuminum Cyminum | 05 | ıо |  |
| 14150 | Dill. For sowing. Seeds used for flavoring vinega | A nethum graveolens | 05 |  |  |
| 14154 | " Mammoth. Much larger than ab | A nethum graveole |  | 20 |  |
| 14160 | Elecampane. Has tonic and expectorant qu | Inula Helenium | 05 |  |  |
| 14170 | Fennel, Sweet. Seeds aromatic; for flavoring | Anethum Freniculum |  |  |  |
| 14180 | Florence. In flavor resembling celery | Anethum Fæeniculum |  |  |  |
| 14190 | Foxglove, Purple. Has medicinal qualit | Digitalis purpurea. |  | 15 |  |
| 14200 | Fumitory. A medicinal herb | Fumaria officinalis |  |  |  |
| 14210 | Hemlock. Has medicinal qualities; poisonou | Conium maculatum | Io |  |  |
| 14220 | Henbane. Has medicinal qualities; poisonou | Hyoscyanus niger |  | 15 |  |
| 14230 | Horehound. Has medicinal quali | Marrubium vulga | 05 | 20 |  |
| 14240 | Hyssop. Has medicinal qualities | Hyssopus officinalis | 05 | 15 |  |
| 14250 | Lavender. True. For oil and distilled water | Lavandula vera. | ${ }^{10}$ | 60 |  |
| 14260 | Lavender. Possessing qualities as above in a lesse | Lavandula spica | 05 |  |  |
| 14270 | Marshmallow. Has medicinal qualities | Althea officinalis |  | 30 |  |
| 14280 | Marigold, Pot. Single. For medicinal purpose | Calendula officinalis | 05 | 15 |  |
| 14290 | Marjoram, Sweet. Is used in seasoning | Origanum Majorana | 05 | 15 |  |
| 14294 | " Pot. Is used in seasoning. | Origanum Onites |  |  |  |
| 14300 | Mint. Curled Mint. . . . . . . . . . Pkt. of 200 seeds, 25 | Mentha crispa. |  |  |  |
| 14310 | Peppermint . . . . . . . . . . . Pkt. of 200 seeds, 25 cts. | Mentha piperita |  |  |  |
| 14314 | Spearmint . . . . . . . . . . . . . Pkt. of 200 seeds, 25 ct | Mentha viridis. |  |  |  |
| 14320 | Pennyroyal. Has medicinal qualities | Hedeoma pulegioides | ıо | 80 | 8 оо |
| 14330 | Rosemary. Yields an aromatic oil and | Rosmarinus officinalis | ıо | 30 |  |
| 14340 | Rue. Said to have medicinal qualities | Ruta graveolens | ıо | 30 |  |
| 14350 | Saffron. Is used in medicine, and also in | Carthamus tinctoriu |  |  |  |
| 14360 | Sage, Broad-leaf. A culinary herb; also used in medic | Salvia officinalis | 05 | 15 |  |
| 14370 | Red. Is used as a culinary herb; also in medicin | Salvia Horminum. | 05 |  |  |
| 14380 | " Purple. Is used as a culinary herb; also in medic | Salvia Horminum | 05 | Io |  |
| 14390 | Savory, Summer. Is used as a culinary herb | Satureja hortensis | 10 | 35 |  |
| 14400 | Winter. Is used as a culinary herb | Satureja montana | ıо | 30 |  |
| 14410 | Tansy. Generally used in bitters | Tanacetum vulgare |  | 35 | 350 |
|  | Tarragon. True. Does not produce seed. Roots in fall and spring. ............ 35 cts. each, $\$ 3.50$ doz. | Artemisia Dracunculus.. |  |  |  |
|  | Thyme, Broad-leaved English. Is used as a seasoning | Thymus vulgaris. | ıо | 45 |  |
| 14440 | French | Thymus vulgaris | ıо |  |  |
| 14450 | Woodruff (Waldmeister, or Maitrank) | Asperula odorata | ıо | 60 |  |
| 14460 | Wormwood. Has medicinal qualit |  | 05 |  |  |

We pay postage or express charges on all seeds bought by the packet, ounce or quarter-pound

## TOBACCO SEED


BIRD SEEDS, ETC.
Prices variable. Bags and transportation charges extra


## VEGETABLE PLANTS

## We shall have some of the standard sorts at their proper seasons

## ESCULENT PLANTS AND ROOTS

| Asparagus Roots. Plant either in fall or spring. | 100 | 1,000 |
| :---: | :---: | :---: |
| - Conover Colossal. Two years old; in bundles of 50 | \$1 00 | \$7 00 |
| Palmetto. Two years old, in bundles of 50 | I 00 | 700 |
| Columbian Mammoth. Two years old. | I 00 | 700 |
| Chive Plants. Plant early in spring |  |  |
| Cinnamon Vine Roots (Dioscorea Batatas; Chinese Yam) | 300 |  |
| Horse-radish Roots. Cut in pieces. Plant in spring <br> "Maliner Kren." In bundles of 50 | $\begin{array}{r}75 \\ \mathrm{r} \\ \hline 00\end{array}$ | 700 |
| Artichoke Roots, Jerusalem Globe. |  |  |
| Rhubarb Roots. Strong |  |  |
| Tarragon Plants (Estragon) |  |  |

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LAWNS LIKE THIS CAN BE PROCURED BY SOWING THORBURN'S LAWN GRASS SEED

## About Lawns and Lawn Grass Seed

## FORMATION OF LAWNS FROM SEED

The ground should be thoroughly drained and well prepared. The soil ought not to be too rich, as a rapid growth is not wanted in the grasses of a lawn; but the surface should be as much alike in quality as possible and thoroughly pulverized. After sowing, the ground should be rolled and cross rolled in order to press the seed firmly into the soil, and ten days or so thereafter a light application of Thorburn's Lawn Fertilizer, mixed with an equal quantity of good loam or sand, will serve to stimulate the growth of the young grasses. The best time to apply this is just before a rain, the idea being to have the fertilizer washed into the roots. The proper time to sow grass seed depends, of course, upon the latitude. In the Central and Eastern States from March 15 to the middle of May is the best time; but in favorable seasons the sowing may be done up to July I. Seed may also be sown in the fall, from the latter part of August to the end of September. The sowing should be done when the ground is moist, or before an expected rain, and a subsequent rolling is always advisable. As to weeds in newly made lawns, it may not be generally known that many weed seeds actually lie dormant in the ground for six or seven years and will germinate and make their appearance when the soil is turned up. The annual wild grasses, such as Crab Grass or Summer Grass, must be pulled up by the roots before they ripen their seed in the fall. This is the only sure way to rid lawns of these pests.

Rolling.-As soon as the frost is out of the ground in the spring, the land should be gone over with a heavy roller. Winter frosts loosen the soil, and rolling is necessary to compress it again. Roll frequently.

Mowing.-All turf-forming grasses are improved, both in vigor of root-growth and in fineness of texture, by frequent mowings. It is impossible to say just how often the grass should be mown, as that depends upon the rate at which it grows. Too close cutting should be guarded against, however, especially during the hot summer months, when the roots require some top-growth to protect them from the burning sun. A good top-growth is also necessary to protect the roots from severe winter frosts.

To Grass a Bank or Terrace.-For each square rod, take a pound of Terrace Lawn Grass Seed and mix it thoroughly with 6 cubic feet of good, dry garden loam; place in a tub, and add liquid manure, diluted with about two-thirds of water, so as to bring the whole to the consistency of mortar. The slope must be made perfectly smooth, and then well watered, after which the paste should be applied, making it as even and thin as possible.

It is a good plan to sow on good land, in any out-of-the-way place, strips for sod to be used for patching poor parts of the lawn, or for grass borders, etc. The best mixture of seed for this purpose is Agrostis stolonifera, Cynosurus cristatus and Poa pratensis.


BY SOWING THORBURN'S LAWN GRASS SEED MIXTURE FOR SHADY SPOTS RESULTS LIKE THIS CAN BE OBTAINED

## Lawn Grass Seed Mixtures

## The Thorburn Lawn Grass Seed

Practically all the finest lawns in America were produced from this mixture. It is composed exclusively of permanent grasses that make a finer and thicker turf the older they become, and yet give a rich green sward in three or four weeks from the time of sowing. The ordinary Central Park Lawn Grass Seed, as usually sold, is not to be compared with this superior mixture. It should be sown at the rate of 4 to 5 bushels to the acre ( 15 pounds to the bushel). Per pt., 15 cts.; qt., 25 cts.; 2 qts., 45 cts.; $1 / 2 \mathrm{pk}$, 75 cts.; pk., $\$ \mathrm{I} .20$; bus., $\$ 4$.

## Thorburn's Lawn Grass Seed for the South

A mixture of grasses that stand extremes of heat and drought well and that are therefore peculiarly adapted for southern lawns. Per qt., 35 cts.; 2 qts., 60 cts.; $1 / 2$ pk., $\$ 1$; pk., $\$ \mathrm{r} .75$; bus. of 20 pounds, $\$ 6.50$.

## Thorburn's Special Lawn Grass Mixture

This extra-choice mixture contains a large proportion of the finer and more expensive species, such as Rhode Island Bent, Crested Dog's-tail and Creeping Bent, in extra-heavy samples, bringing the weight up to 20 pounds per bushel, and producing a turf of the closest and finest texture possible. Per qt., 30 cts.; 2 qts., 55 cts.; 1/2pk., 90 cts.; pk., $\$ \mathrm{I} .60$; bushel of 20 pounds, $\$ 5.50$.

## Thorburn's Grass Mixture for Shady Spots on Lawns

A mixture of grasses that thrive in shaded situations, under trees, or close to walls where there is little sun. Per qt., 40 cts.; 2 qts., $70 \mathrm{cts} ; 1 / 2 \mathrm{pk}$. $\$ \mathrm{I} .25$; pk., $\$ 2$; bushel of 22 pounds, $\$ 7$.

## Thorburn's Lawn-Restoring Grass Seed

A mixture of grasses peculiarly suited to take firm hold and grow quickly on hard, worn-out or burned spots. The best time to re-sow them is very early in the spring; but seed may also be sown in the fall from first of September to first of October. Some Lawn-restoring Grass Seed should also be sown before every summer rain on thin places. Per qt., 35 cts.; 2 qts., 60 cts.; $1 / 2$ pk., $\$ 1$; pk., $\$ 1.75$; bushel of 20 pounds, $\$ 6$.

## Thorburn's Lawn Grass Mixture for the Seashore

A mixture of fine grasses peculiarly suited to seaside lawns. Per qt., 30 cts.; 2 qts., 50 cts.; $1 / 2$ pk., 85 cts .; pk., $\$ \mathrm{I} .50$; bushel of 18 pounds, $\$ 5$.

## Terrace Lawn Grass Seed

A mixture of fine stoloniferous grasses peculiarly adapted to terraces. Per qt., 35 cts.; 2 qts., 60 cts.; $1 / 2 \mathrm{pk}$., $\$ \mathrm{I}$; pk., $\$ \mathrm{I} .75$; bushel of 20 pounds, $\$ 6$.


## Permanent Grass Seed for Golf-Links, TennisCourts, Polo-Grounds, etc.

We have devoted much attention to the seeding and preservation of golf-links, tennis-courts and polo-grounds, and offer the following mixtures, which have been used on most of the finest links, etc., in the country, with very satisfactory results.

## Polo-Grounds Mixture

A mixture of fine-leaved and deep-rooting grasses, forming a strong and lasting turf that will stand hard usage. Per bushel of 20 pounds, $\$ 4$.

## Tennis-Court Mixture

A mixture of extra-fine grasses peculiarly adapted to tennis-courts. This mixture will make a firm, green and lasting turf of the finest texture, that will improve with the trampling it receives. Per qt., 35 cts.; 2 qts., 60 cts.; $1 / 2 \mathrm{pk}$., $\$ \mathrm{I}$; pk. \$I.75; bushel of 20 pounds, $\$ 6$.

## Fair-Green Mixture

For the grounds in general. Per bushel of 20 pounds, $\$ 4$.

## Putting-Green Mixture

## Far superior to any other similar mixture offered

Our own special formula as furnished all the leading golf clubs in America. A mixture of extra-fine highest-grade grasses, that will make a close, firm, green and lasting turf, which will improve with trampling. Per qt., 40 cts.; 2 qts., 70 cts.; $1 / 2 \mathrm{pk}$., $\$ 1.25$; pk., $\$ 2$; bushel of 24 pounds, $\$ 7$.

## Grass Mixture for Railroad Banks, etc.

A mixture of grasses with long, interlacing, matting roots that will bind steep embankments, gravelly or sandy slopes, etc., preventing washouts by rainstorms and covering with permanently green turf. Per qt., 30 cts.; 2 qts., 50 cts.; $1 / 2$ pk., 80 cts.; pk, $\$ \mathrm{I} .25$,; bushel of 18 pounds, $\$ 4.50$.

Ants in Lawns. A good way to get rid of ants is by the use of bisulphid of carbon. Observe where the ant-hill is, then with a stick make several holes in the ground about $\mathbf{1 2}$ inches deep. Into each hole pour an ounce of the bisulphid and immediately press the earth down tight with the foot. The poisonous gas from the bisulphid spreads all through the ant-hill and is quickly fatal. It is rarely that more than one application is needed. Remember, in using this substance, that it is extremely inflammable.

[^3]
## Grass Mixtures for Meadows and Pastures

It is a well-ascertained fact that a thicker and more prolonged growth is produced by a mixture of many sorts of grasses than by only one or two. For every different kind and condition of soil there are grasses that are especially suitable. Some sorts do best on high ground and in dry weather; others prefer plenty of moisture. Some mature so early and others so late that from the beginning of spring until winter sets in there is no time when one species or another is not at its best. Grass seed may be sown either early in spring or in fall from first of September to middle of October in this latitude.

For about a hundred years our house has made a specialty of grasses. We were probably the first to introduce to this country, for commercial distribution, the many valuable natural and cultivated foreign species that now take such an important part in our agricultural economy. The formation of permanent pastures and meadows has, for many years, been a subject of careful study with us, and the following formulæ for seeding grass-lands have received universal recognition. The quantities given are the minimum, and may often be increased to advantage.

## MEADOW MIXTURES FOR ONE ACRE


$40 \mathrm{lbs} . \$ 4$ per bushel of 20 lbs . Sow 2 bushels to the acre

## No. 2. On High and Dry Land

 5 lbs. Red Top.4 " Tall Meadow Oat Grass.
2 " Meadow Brome Grass.
21⁄2" Crested Dog's-tail.
2 " Orchard Grass.
2 " Hard Fescue.
8 " Sheep's Fescue.
I " Meadow Soft Grass.
ıо " Timothy.
r " Canada Blue Grass.
2 " Red Clover.
$1 / 2$ " Kentucky Blue Grass

No. 3. On Wet Late Land I2 lbs. Red Top.

6 " Orchard Grass.
2 ". Tall Meadow Oat Grass.
3 " Meadow Fescue.
$1 / 2$ " Tall Fescue.
I " Meadow Soft Grass.
ıо " Perennial Rye Grass.
4 " Timothy.
I " Red Clover.
$1 / 2$ " Alsike Clover.
$40 \mathrm{lbs} . \$ 4.50$ per bushel of $20 \mathrm{lbs} .40 \mathrm{lbs} . \$ 4$ per bushel of 20 lbs. Sow 2 bushels to the acre

## PASTURE MIXTURES FOR ONE ACRE

|  | On Good Land, neither Too Dry nor Too Wet |
| :---: | :---: |
| 2 lbs . | Tall Meadow Oat Grass. |
| " | Red Top. |
| 6 " | Orchard Grass. |
| 4 " | Sheep's Fescue. |
| 2 " | Hard Fescue. |
| $1 \times$ | Meadow Soft Grass. |
| 9 " | Perennial Rye Grass. |
| I " | Meadow Foxtail. |
| 3 " | Kentucky Blue Grass. |
| 2 " | Timothy. |
|  | Red Clover. |

No. 5. On Dry Land

3 lbs. Red Top.
2 $1 / 2$ " Tall Meadow Oat Grass.
I " Meadow Brome Grass.
4 " Orchard Grass.
2 " Hard Fescue.
7 " Sheep's Fescue.
5 " Timothy.
ıо " Perennial Rye Grass.
1 $1 / 2$ " Red Clover.
4 " Canada Blue Grass.

No. 6. On Wet Land
9 lbs. Red Top.
7 " Orchard Grass.
2 " Meadow Fescue.
I " Tall Fescue.
3 " Meadow Soft Grass.
ıо " Perennial Rye Grass.
" Meadow Foxtail.
2 " Timothy.
I " Rough-stalked Meadow Grass.
3 " Kentucky Blue Grass.
I " Alsike Clover.
$40 \mathrm{lbs} . \$ 4.25$ per bushel of $20 \mathrm{lbs} .40 \mathrm{lbs} . \$ 4.25$ per bushel of $20 \mathrm{lbs} .40 \mathrm{lbs} . \$ 4.25$ per bushel of 20 lbs ,
Sow 2 bushels to the acre
The various grasses used in the above mixtures are fully described on the following pages.
We are always glad to make up Special Mixtures, and are pleased to answer inquiries as to the best grasses for different purposes and for sowing on various soils under varying climate conditions.

[^4]
## Grass Seeds

We desire to call particular attention to the fact that Grass Seeds are sold in the trade by sample, and each sort is divided into three or four grades of quality, according to purity, germination and weight. The price of the best grade is often double that of the ordinary. The Grass Seeds here offered by us are in every case the VERY HIGHEST GRADE.

25 lbs . and up of any one sort at the $100-\mathrm{lb}$. rate. Not less than one pound of any one sort sold.
The prices are subject to change as the season advances. The weight per bushel is average actual weight.

AGROSTIS CANINA (Rhode Island Bent Grass). Resembles Red Top ( $A$. vulgaris, described below), but is of dwarfer habit, with shorter and narrower leaves. It makes a beautiful, close, fine turf, and is one of the very best grasses for lawns in mixture with other sorts. It adapts itself to almost any soil, rich and moist, or dry, sandy and sterile. It is a native of Europe, but has been cultivated in the Eastern States for many years. 60 lbs . of seed to the acre is recommended for lawns. Height, it to 2 feet. ( 16 lbs. to the bushel.) Per lb., 37 cts.; io lbs., $\$ 3.50$; 100 lbs., $\$ 32$.
AGROSTIS STOLONIFERA, TRUE (Creeping Bent, or South German Fiorin). The only true Creeping Bent Grass. The distinctive feature of this species is, as the name implies, its compact, creeping, rooting stems. It is of rapid growth and spreading habit, and the stoloniferous roots which it sends down into the soil form a strong, enduring turf that is positively improved by constant trampling. The other varieties of Agrostis are distinguished from this sort by their flattened, parallel surface roots. Being of fine texture, it is most valuable for lawns and putting-greens. If sown alone, 60 lbs. to the acre should be used. (i8 lbs. to the bushel.) Per lb., 40 cts.; Io lbs., $\$ 3.75$; ioo lbs., \$35.
AGROSTIS VULGARIS (Red Top; Herd's Grass). A very hardy, native perennial grass, succeeding best on moist land. It accommodates itself to a variety of soils, however, even to dry situations, and stands our hot climate admirably. It is, perhaps, the most permanent grass we have, and it enters largely into the composition of our best natural pastures. It remains green for the greater part of the year, and its long, trailing stems form a very close, matting turf that is not affected by trampling. The seed, as usually sold, weighs 15 to 18 lbs. to the bushel, in the chaff, and 4 bushels of it is required to sow an acre. Per lb., 18 cts.; ro lbs., $\$ \mathrm{I} .60$; , $100 \mathrm{lbs} ., \$$ I4.
(The absolutely clean or "fancy"" seed offered weighs about 36 lbs . to the measured bushel; 36 lbs. of it is sufficient to sow an acre.)
Fancy Heavy Red Top Grass. Absolutely clean and free from chaff. About 36 lbs . to the acre. ( 36 lbs . to the bushel.) Per lb., 26 cts.; io lbs., \$2.40; ioo lbs., \$22.
AIRA CesPITOSA (Hassock Grass). A coarse grass, preferring stiff and marshy bottoms and thriving in moist and shady woodlands. In England, door-mats are formed of it by the cottagers. 30 lbs. to the acre. ( 18 lbs to the bushel.) Per lb., 23 cts.; 10 lbs., $\$ 2$; 100 lbs., $\$ 18$.
AIRA FLEXUOSA (Wood Hair Grass). Delights in high and rocky hills; it is of little agricultural value except for sheep pasture. 30 lbs. to the acre. Per lb., 22 cts.; io lbs., $\$ 2$; ioo lbs., $\$ 18$.
ALOPECURUS PRATENSIS (Meadow Foxtail). One of the best permanent pasture grasses for


RED TOP GRass (Agrostis vulgaris)
rich, moist soil. Its chief characteristics are its earliness and its faculty of standing high summer heats without burning. It prefers moist, low grounds, but it accepts drier situations, and makes an earlier spring verdure than any other variety. Sow only in connection with other grasses, 3 to 4 lbs. to the acre; if sown alone, 25 lbs. to the acre. Height, 2 to 3 feet. Per lb., 35 cts.; Io lbs., $\$ 3.25$; Ioo lbs., \$30.
AMMOPHILA ARUNDINACEA (Beach Grass). Valuable on the sandy seashore, canal and railway banks, etc. Its strong, creeping, matting roots bind the drifting sand into natural embankments against the action of winds and waves. This grass is usually propagated by transplanting in the fall. Where it is necessary to use seed, it should be sown in spring, and ground covered with brush to hold the seed in place until it has taken firm hold. Height, 2 to 3 feet. Per lb., 70 cts.; Io lbs., \$6.50; 100 lbs., \$60.
ANTHOXANTHUM ODORATUM (True Perennial Sweet Vernal Grass). For a mixture with pasture grasses, it is valuable on account of its vernal

Anthoxanthum odoratum, continued
growth, and also for continuing to throw up root foliage until late in the autumn. For meadows, its chief merit is the fragrant odor which the leaves emit when partially dried, thus sweetening hay. It is a vegetable condiment, rather than a grass of much nutritive value. From 2 to 3 lbs . to the acre, when mixed with other grasses. Per lb., 80 cts.; io lbs., $\$ 7.50$.

## ANTHOXANTHUM ODORATUM PUELLI

(Annual Sweet Vernal Grass). Much smaller than the perennial, and of much less value, lasting one year only. 20 to 25 lbs . to the acre. Per lb., 28 cts.; Io lbs., \$2.65; 100 lbs., \$25.
AVENA ELATIOR (Tall Meadow Oat Grass). Most valuable for pasture on account of its early and luxuriant growth; it produces an abundant supply of foliage, which is relished by cattle early and late. For hay it may be cut twice a year, and for green soiling it may be cut four or five times in favorable seasons. It is very hardy, and withstands extreme drought and heat and cold. It is very valuable for our Southern States, where it is extensively cultivated for winter grazing and for hay. Height, 2 to 4 feet. 50 lbs . to the acre. Per lb., 26 cts.; io lbs., $\$ 2.40$; Iоo lbs., $\$ 22$.
avena flavescens (True Golden Oat Grass). Will not thrive well when sown alone, but with other species it becomes desirable for dry meadows and pastures. About 25 lbs . to the acre. Per lb., \$1.25.

## BEACH GRASS. See Ammophila arundinacea.

BERMUDA GRASS (Cynodon dactylon). A most valuable grass for our Southern States, both for pasture and lawns. It is of dwarf habit, with long, creeping stems rooting at the joints and covering the ground with a matting of fine turf, which no amount of trampling will impair. It is also useful for binding drifting sand and for steep embankments subject to wash. When established it is difficult to eradicate, and is therefore unsuitable for temporary pastures. It requires heat and moisture to start it. As it cannot endure frost, it is of no value north of Virginia. It thrives in the poorest and sandiest soil, and resists extreme drought and intense tropical heat. It should be sown at the rate of 15 lbs . to the acre. Crop doubtful. Per lb., \$1.25; io lbs., \$11; ioo lbs., \$100.
BLUE GRASS, Canada. See Poa compressa. English. See Festuca pratensis. Kentucky. See Poa pratensis.
BROMUS INERMIS (Awnless, or Smooth Brome Grass). An erect perennial, 3 to 5 feet high, native of Hungary, where it is considered one of the best hay grasses, yielding a good return in the arid and silicious soil. The nutritive quality of its hay, however, is generally inferior to that of our standard native sorts, so that we should recommend it only for dry, arid soils where the better and more delicate grasses would not grow. It is strongly stoloniferous, its creeping rootstocks spreading rapidly under ground and giving out new plants. It is on this account undesirable for temporary meadows, being difficult to eradicate when once established. Sow 35 to 40 lbs . to the acre. Per lb., 22 cts.; 1о lbs., $\$ 2$; 100 lbs., $\$ 18$.
BROMUS MOLLIS (Soft Chess). This annual grass is so called because its stems and leaves are downy and soft to the touch. In good soil it rapidly produces an abundant forage, but of poor quality and little relished by cattle. It can be recom-

## Bromus mollis, continued

mended only for the poorest kind of sandy soil, where grasses of better quality will not grow. 30 lbs . to the acre. Per lb., 20 cts.; 10 lbs., $\$ \mathrm{I} .75$; 100 lbs ., \$15.
BROMUS PRATENSIS (Meadow Brome Grass). A hardy perennial, 2 to $3^{1 / 2}$ feet high, much used in mixtures for meadows, both for mowing and pasture. It is not recommended to be sown alone except in poor soil, on dry, stony hillsides, where better grasses will not grow. It withstands extreme cold and drought, and, if cut before flowering, it makes a good hay. If left to grow older, it becomes very tough. 30 lbs. to the acre. Per lb., 22 cts.; io lbs., $\$ 2$; 1о0 lbs., $\$ 18$.
BROMUS SCHRADERI (Rescue Grass). In good, rich soil, several crops have been cut in a season. It cures into hay of fair nutritive quality, but it is more suitable for pasture, or for cutting and feeding green. It is a most valuable grass for growing in the South and for the tropics. Height, I to 2 feet. 30 lbs . to the acre. Per lb., 22 cts ; 10 lbs., \$2; ioo lbs., \$18.
CALAMAGROSTIS ARENARIA. See Ammophila arundinacea.
CYNOSURUS CRISTATUS (Crested Dog's-tail). A stoloniferous perennial, forming a smooth, compact. and lasting turf. It thrives best on rich, moist land, but it can accommodate itself to almost any soil. Its roots penetrate deeply into the ground, which enables it to stand severe droughts. It makes a good bottom grass and is therefore valuable in mixtures for lawns and putting-greens. It thrives well in the shade. The color is the same as that of the Kentucky Blue Grass, and it is, therefore, excellent in mixture with that sort. If sown alone, 30 pounds to the acre is none too much, but it is recommended only in mixture with other sorts. Height I to 2 feet. Per lb., 35 cts.; io lbs., $\$ 3.25$; roo lbs., $\$ 30$.
DACTYLIS GLOMERATA (Orchard Grass; Cocksfoot). One of the grasses most employed in permanent meadows, either for pasture or for mowing. It is very hardy and succeeds well anywhere in the United States. It is very productive and makes excellent hay. If cut before it flowers it is less hard and the pith of the stem is soft and sweet. It blossoms about the same time as Red Clover, and is therefore desirable in mixture with that plant. Stock of all kinds are very fond of it, either dry or green, and it endures constant cropping better than any other grass. After being mown, it grows up quickly and yields a heavier aftermath than any other variety. It can stand considerable shade, and is recommended as a pasture grass for woodlands. Its tendency to grow in tussocks is diminished if it is sown with other grasses, and also by heavy rolling in the spring. But it is quite unsuitable for lawns. Height 3 feet. (I4 lbs. to bushel.) Sow 3 to 4 bushels to the acre. Per lb., 25 cts.; 1o lbs., \$2.25; Ioo lbs., \$20.

## DOG'S-TAIL. See Cynosurus cristatus.

ELYMUS ARENARIUS (Lime Grass). Valuable on the sandy seashore, canal and railroad banks, etc. It tends, with its tough, wide-spreading and thickly matting roots, to form natural and permanent embankments, thus serving to prevent the drifting of the sand and to protect an exposed shore from wind and waves. It is of no agricultural value. Per lb., 60 cts.; ; $1 \mathrm{lbs}$. , $\$ 5.65$; 100 lbs., \$52.

FESTUCA DURIUSCULA (Hard Fescue). This is a variety of $F$. ovina, dwarfer and less vigorous in growth, but possessing all the other valuable characteristics of that variety. It is emphatically a grass for dry lands, doing well on sandy and shallow silicious soils. It is exceedingly hardy and withstands extremes of heat and cold, and also long periods of drought. For permanent pastures on poor lands it is especially valuable; but it may also be used in meadow mixtures for well-manured clayey lands. In the latter case it has been known to yield a good crop of excellent hay and a very large aftermath. On account of its stooling habit, it is not recommended for lawns. Height, I to 2 feet. 30 lbs . to the acre. Per lb., 27 cts.; io lbs., $\$ 2.50$; 100 lbs ., $\$ 23$.
FESTUCA ELATIOR (Tall Fescue). This grass is a native of Europe, but was long ago introduced in this country, and is now naturalized, and widely grown here. It succeeds best in moist, alluvial, and strong, clayey soils. It is very productive and of long duration, and is especially valuable for permanent pasture. Stock of all kinds eat it readily, and its nutritive value is said to be very great. On rich, moist lands it yields a large amount of hay of excellent quality. It is not suitable for lawns. Height, 3 to 4 feet. 40 lbs. to the acre. Per lb., 40 cts.; Io lbs., $\$ 3.75$; 100 lbs., \$35.
FESTUCA FLUITANS (Floating Fescue). A perennial with long, creeping roots, and preferring a rich, muddy or alluvial soil. It is found in ditches, shallow ponds, sides of rivers and lakes, and in boggy, and marshy ground. As trout and wild duck are very fond of the seeds and tender shoots, it is often introduced on the margins of ponds and rivers with the view of affording them nourishment. Per lb., 55 cts.
FESTUCA HETEROPHYLLA (Various-leaved Fescue). A very early, hardy perennial, 2 to 3 feet high, thriving best in cold, moist soils that are rich in humus and potash. In such soils it yields heavily, and is valuable in grass mixtures for permanent meadows either for mowing or grazing. Its great production of root-leaves makes it an excellent bottom grass. Its nutritive value is said to be very high. It grows very well in the shade, and is highly recommended for shaded lawns in mixture with other grasses. 40 lbs . to the acre. Per lb., 35 cts.; Io lbs., $\$ 3.25$; ioo lbs., \$30.
FESTUCA OVINA (Sheep's Fescue). A native both of America and Europe. In our Northwestern States there are many varieties of it, some of which grow 2 or 3 feet high. It prefers dry uplands and thrives in poor, shallow, gravelly soils, where other grasses would fail. It is very hardy, resisting extreme heat and cold. Though of dwarf growth, it grows thickly, yielding a large amount of nutritious herbage. In grass mixtures, for pastures on high and dry lands, it is especially valuable. Though a "bunch grass," it may be included in lawn mixtures as well as in fair-green mixtures on account of its fine foliage and dwarf, dense growth. $1 / 2$ to $11 / 2$ feet. 35 lbs . to the acre. Per lb., 30 cts.; Io lbs., $\$ 2.75$; Ioo lbs., $\$ 25$.
FESTUCA PRATENSIS (Meadow Fescue, or English Blue Grass). One of the grasses most used in permanent or temporary meadows for mowing or for pasture. It succeeds best in cold, moist, light soils, in well-drained meadows and in low valleys rich in organic matter. It should not be grown at all on warm, dry land. It does not

Festuca pratensis, continued
reach its full development till the second or third year, when it far exceeds most other sorts in the quantity of its produce and nutritive matter. After being mown, it grows again very quickly. The forage, either green or dried, is very nourishing and much relished by cattle, especially when it is cut young. Height, 2 feet. 40 lbs . to the acre. Per lb., 25 cts.; 10 lbs., $\$ 2.25$; 100 lbs., $\$ 20$.
FESTUCA RUBRA (Red or Creeping Fescue). True. A creeping-rooted species forming a close and lasting turf, and especially adapted for dry, sandy soils. It resists extreme drought, and thrives on very inferior soils, gravelly banks and exposed hillsides. It is also valuable for shady places in lawns, as well as for golf-courses and for binding shifting sands on the seashore. (24 lbs. to bushel.) 30 lbs , to the acre. Per lb., 30 cts.; io lbs., \$2.85; 100 lbs ., $\$ 27$.
FESTUCA TENUIFOLIA (Slender Fescue). This is really a variety of Festuca ovina, with much finer leaves. It will grow on very dry and inferior soils, and its dwarf habit of growth and fineness of leaf render it not unsuitable for dry slopes on lawns and golf-links. It stands grazing well, is very hardy, and lasts long, and may therefore be recommended for permanent pasture on high and dry situations. 30 lbs to the acre. ( 22 lbs . to bushel.) Per lb., 50 cts.; io lbs., $\$ 4.75$; 100 lbs., $\$ 44$.

## FOXTAIL. See Alopecurus pratensis.

HOLCUS LANATUS (Meadow Soft Grass; Velvet Grass). This grass is of fair agricultural value, and it will thrive on poor soil, where better sorts will not grow. It is a perennial, very hardy and grows rapidly. As a forage plant its nutritive value is small, yet it makes a hay that is eaten readily by cattle, especially when it is sprinkled with salt. Height, I to 2 feet. 35 lbs . to the acre. Per lb., 18 cts.; io lbs., $\$$ I. 60 ; Ioo lbs., $\$$ I4.
HUNGARIAN GRASS. See Panicum germanicum.
JOHNSON GRASS. Doubtful.
LOLIUM PERENNE (Pacey's Perennial Rye Grass). Although called a perennial, it seldom lasts more than three or four years. It is the most valuable grass of Great Britain, both for pasture and for meadows, occupying there the same relative position of importance that Timothy holds here. The cool, moist climate of England seems to suit it best, yet it succeeds very well in our Middle and Eastern States, and adapts itself to a great diversity of soils. The seed is large and heavy, and produces a strong, verdant growth in four or five weeks after sowing. It cures into hay having a sweet flavor, and is much relished by cattle and horses. Its nutritive value, especially in mixture with Red Clover, is very great. It is excellent in mixtures for quick effects in lawns or golf-links. Height, $\mathrm{I}^{1 / 2}$ to 2 feet. 60 lbs . to the acre. ( 28 lbs . to bushel.) Per lb., I3 cts.; ; lbs., \$1; 100 lbs., \$8.
LOLIUM PERENNE. Fancy. A carefully selected, short-seeded, dwarf-growing strain, suitable for lawns. Makes a fine green turf in three weeks. Per. lb., 20 cts; io lbs., $\$ \mathrm{I} .50$; 100 lbs., $\$ 12$.
LOLIUM ITALICUM (Italian Rye Grass). Though lasting two or three years under very favorable circumstances, it is practically an annual. Like the Perennial Rye Grass, it is a remarkably rapid grower, and has, in addition, the advantage of standing extremes of temperature, remaining green throughout the winter, and retaining its freshness in the hottest summer months and dur-


FIELD OF TIMOTHY

Lolium italicum, continued
ing prolonged drought. When sown very thickly or in mixture with other sorts, it makes a good, dense turf, and it has been used with much satisfaction on lawns as far south as Jacksonville. On rich, moist soils, it is exceedingly productive and may be cut in four or five weeks after sowing, and every six weeks after that until frost. For temporary meadows, on good soils, it is a most valuable grass. Height, $\mathrm{I}^{1 / 2}$ to $2 \frac{1}{2}$ feet. 50 lbs . to the acre. ( 22 lbs . to bushel.) Per lb., I5 cts.; io lbs., \$I.25; 100 lbs., \$10.

## OAT GRASS. See Avena elatior.

ORCHARD GRASS. See Dactylis glomerata.
PANICUM GERMANICUM (Hungarian Grass). One of the most valuable annual soiling plants. It grows on any ordinary soil; withstands drought well. As it is of very rapid growth, being ready for cutting within sixty days, it may be sown in this latitude as late as the middle of July for hay, or in the middle of August for green fodder. It should be cut just before blooming. Sow I to $11 / 2$ bushels to the acre. (50 lbs. to bushel.) Per lb., I3 cts.; $10 \mathrm{lbs} ., \$ \mathrm{I}$. ; ioo lbs., $\$ 8$.
PASPALUM DILATATUM (Australian Water Grass). A somewhat leafy perennial, growing in clumps. Valuable as a pasture grass for the South, endures summer heat and drought very well and is especially desirable for furnishing late summer and autumn feed, during which period it makes its principal growth. Sow lightly on the surface in warm weather. The seed should barely be covered with soil. Sow from 8 to 10 lbs. to the acre, with 5 lbs. of Hungarian Grass as a temporary protection. Per lb., $45 \mathrm{cts} . ;$ Io lbs., \$4; ioo lbs., \$35.

PHALARIS ARUNDINACEA (Reed Canary Grass). A hardy perennial, preferring stiff, wet land, but also doing fairly well in dry, sandy soils. It grows well in ditches and by riversides, where its strong, creeping root-stocks render it valuable for binding the banks. Its seed also affords food for trout and wild fowl. When young, it may be cut for green forage for cattle, but in its more mature state, it is too coarse for this purpose. ( 30 lbs. to bushel.) Per lb., 90 cts.
PHLEUM PRATENSE (Timothy). A native of Europe, but long ago naturalized in America, where it ranks as by far the most important of hay grasses. On moist, loamy or clayey soil it produces a larger hay crop than any other grass. It is not so well suited for light, sandy soils. Though preferring a moist, temperate climate, it withstands drought and extreme heat and cold. Its hay is very nourishing and can be preserved for a long time. It should be cut when flowering, as if left later the hay becomes hard and coarse. It is often sown with Red Top Grass and Red Clover, and the nutritive value of the hay is greatly increased by this mixture. Height, 2 to 3 feet. If sown alone, at least 25 lbs . to the acre should be used. The seed weighs 45 lbs. to the bushel. Several grades are always on the market, differing in purity and vitality. It is always most economical to buy the highest grade, known as "Fancy." Per lb., i5 cts.; io lbs., \$I; ioo lbs., $\$ 8.50$.
POA AQUATICA (Water Meadow Grass). This is an excellent pasture grass for very wet situations. It also does well in bogs and marshes, and is useful in the same way as Festuca fluitans. 20 lbs . to the acre. Per lb., 65 cts.

POA COMPRESSA (Canada Blue Grass). Highest grade. A very hardy perennial grass, with creeping root-stocks, forming a close and durable turf of fine texture. It grows on the poorest and driest soils, sandy, gravelly or clayey, standing extremes of wetness or drought, and keeping green until the severe frosts of winter. It is said to be especially valuable for dairy pastures, cows feeding on it yielding the richest milk and finest butter. It is distinguished from the Kentucky Blue Grass by its flattened, wiry stems and by its decidedly bluer color. Height, 6 to 18 inches. 60 lbs. to the acre. Per lb., 22 cts.; io lbs., $\$ 2$; 100 lbs., $\$ 18$.
POA NEMORALIS (Wood Meadow Grass). The chief characteristic of this grass is its special fitness for shaded positions in lawns and woodland parks, where other grasses will not grow. It is very permanent and hardy, resisting extremes of heat and cold, and is one of the first grasses to show a rich green growth in the spring. The creeping roots are formed under ground, and make a good turf. It should be included in all putting-green mixtures. Excellent for pasture. 30 lbs . to the acre. ( 19 lbs. to bushel.) Per lb., 55 cts.; 10 lbs., $\$ 5$; ioo lbs., \$45.
POA PRATENSIS (Kentucky Blue Grass; June Grass). Highest grade. One of the most widely distributed and valuable native grasses. It combines more points of excellence than any other sort. It is a true perennial, lasting indefinitely and improving every year. Its densely creeping root-stocks, spreading habit and smooth, even

Poa pratensis, continued
growth, fine texture and rich green color render it one of the very best grasses for lawns. It forms a close turf, starts very early in the spring, and lasts till frost. It succeeds in almost any soil-dry, rocky, sandy or gravelly-and stands long-continued dry weather and hot suns. It takes, however, two or three years to become well established, and should, therefore, be sown only in connection with other grasses. If the soil is especially suitable it will eventually crowd these out, and make the finest possible sward. It is one of our most valuable pasture grasses, very productive and nutritious. 50 lbs . to the acre. Per lb., 25 cts.; 10 lbs ., \$2.25; ioo lbs., \$20.
POA TRIVIALIS (Rough-stalked Meadow Grass). A spreading, thickly matted, stoloniferous-rooted species, forming a fine turf, and adapted for shaded portions of lawns. It thrives on rich, moist soil and in sheltered situations, but not on dry land. Valuable for forming bottom-grass in mixtures for permanent pastures. Height, I to 3 feet. 20 lbs . to the acre. ( 26 lbs . to bushel.) Per ib., 55 cts.; io lbs., $\$ 5$; ioo lbs., $\$ 46$.
RED TOP. See Agrostis vulgaris.
RYE GRASS. See Lolium italicum and Lolium регепne.
RHODE ISLAND BENT GRASS. See Agrostis canina.
TIMOTHY. See Phleum pratense.
KENTUCKY BLUE GRASS. See Poa pratensis.

## FOR CLOVERS, SEE NEXT PAGE

For Special Meadow and Pasture Mixtures, see page 58, and for Forage, Economical and Miscellaneous Seeds and Field Corn and Cereals, see pages 65 to 69 . Fertilizers are quoted on page 146 .

The revised edition of our pamphlet on the seeding and preservation of Golf-links is now ready and will be mailed free to anyone desiring a copy.

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For other practical and useful publications, see extensive list on page 54 .
"I am well pleased with the Grass Seed I got of you last summer for my croquet-ground."-J. W. Bost, Indiana, writes under date of April $15,1912$.
"Kindly send me five bushels of your Lawn Mixture, same sort as that of May 18, to arrive here by August 15, at the latest. I am delighted with your seed, and it has excited the admiration of everyone in the neighborhood."-Mrs. B. A. Haggin writes under date of August 4, 1912.

## Clovers

We quote present prices on Clovers as near as it is possible to offer them at as we go to press. We shall be very glad to quote prevailing prices on all of them from time to time, and we solicit inquiries. It is understood, of course, that all are subject to market fluctuations.

ALFALFA, or LUCERNE (Medicago sativa). Requires deep, rich, well-drained soil. The taproot descends often to a depth of io to 15 feet in loose soil. It is, consequently, capable of resisting great droughts. It should be sown alone (about same time as oats are sown in this section) in thoroughly prepared, deeply plowed soil, at the rate of 20 to 25 pounds to the acre. It may also be sown as late as August and up to the middle of September in more southerly localities. The crop should be cut when the plant is coming into bloom. In suitable soil it is perennial, and several crops may be cut every year. Height, I to 3 feet. Per lb., 25 cts.; io lbs., \$2.25; 100 lbs., \$20.
TURKESTAN ALFALFA. From Turkestan. Said to be hardier and more productive than the ordinary variety, and to withstand drought better. Per lb., 25 cts.; io lbs., \$2.25; Ioo lbs., \$I9.
ALSIKE, or HYBRID CLOVER (Trifolium hybridum). A perennial, I to 3 fet high, succeeding best in cold, stiff soils, and in marshy lands which are too wet for other species. It grows well in the far North and in high altitudes. A good honey plant for bees. I 5 lbs . to the acre. Per lb., 35 cts.; Io lbs., \$3.25; IOO lbs., \$30.
BERSEEM, or EGYPTIAN CLOVER (Trifolium alexandrinum). Suitable for a rotating crop on irrigated lands. It is very succulent and much relished by stock. Its value as a soil-renovator is very high. Per lb., 48c., Io lbs., \$4.50; Ioo lbs., \$40.
BOKHARA CLOVER (Melilotus alba). Valuable sort for soiling and for ensilage and bees. Grows from 3 to 5 feet high; sown in rich soil may be cut three times; lasts for years if cut before flowering. I5 lbs. to the acre. Per lb., 30 cts.; io lbs., \$2.75; Ioo lbs., \$25.
BURR CLOVER (Medicago maculata). An annual, making good winter grazing on rich soils. Excellent for the South on Bermuda grass land, taking the place of the latter when killed by frost. Sow in August. 20 lbs. to acre. Per lb., 25 cts; io lbs., \$2.25; Ioo lbs., \$19.
CRIMSON or SCARLET CLOVER (Trifolium incarnatum). Erect annual, I to 2 feet high, with bright scarlet flowers. A native of southern Europe; largely grown in our Southern States for improving the soil by turning under. Will not en-

Crimson Clover, continued
dure severe frost, and cannot be depended upon to stand the winter north of New Jersey. It is a valuable crop for pasturage or green manure. For hay cut when in full bloom. Sow 20 lbs . to the acre. Per lb., I5 cts.; io lbs., \$I.25; 100 lbs., \$II.
JAPAN CLOVER (Lespedeza striata). An annual valuable only in the South, where it thrives in any soil in the driest season. It makes fair hay; eaten readily by stock when green. Valuable for plowing under. Sow in spring broadcast 30 lbs. to the acre. Market price.
KIDNEY VETCH, or SAND CLOVER (Anthyllis vulneraria). A deep-rooted, herbaceous hardy perennial plant, valuable for dry, sandy and inferior soils, upon which Red Clover will not thrive. Eaten with avidity by sheep, cattle and horses; useful in mixture for dry soils. Sow 20 lbs . to the acre. Per lb., 40 cts ; 10 lbs ., $\$ 3.75$; 100 lbs ., $\$ 35$.
RED CLOVER, MEDIUM (Trifolium pratense). One of the most valuable farm crops of the Eastern States for pasture, hay, or for turning under for green manure. Sow in the spring, is lbs. to the acre. Per lb., 30 cts.; io lbs., \$2.80; ioo lbs., \$26.
MAMMOTH RED or PEA-VINE CLOVER (English Cow Grass). Grows larger and lasts longer than the common Red Clover; valuable for plowing under. Io lbs. to the acre. Price variable.
WHITE CLOVER (Trifolium repens). Some White Clover is usually included in lawn grass mixtures. It makes an excellent turf that stands constant trampling. It is of dwarf habit, spreads rapidly and is very hardy. It is valuable in permanent pastures, being sweet and nutritious. Sow in spring. In mixtures, 1 or 2 lbs.; if alone, 8 or Io lbs. to the acre. Per lb., 50 cts.; io lbs., $\$ 4.80$; ioo lbs., $\$ 46$.
YELLOW SUCKLING CLOVER (Trifolium filiforme). Native of northern Europe. Valuable for sheep pastures; recommended in grass mixtures for wet, sandy meadows. Per lb., 50 cts .
YELLOW TREFOIL (Medicago lupulina). An annual or biennial suitable for pastures in wet meadows, or for stiff, clayey soils too poor for Red Clover. It is very useful in some sections, and is sometimes used for hay. I5 lbs. to the acre. Per lb., 27 cts.; io lbs., \$2.50; ioo lbs., \$23. Prices quoted are those ruling January 1, 1913.


## Cereals

Customers will please add cost of bags when ordering, as follows: $1 / 2$ bushel, io cents; I bushel, 14 cents; 2 bushels, 23 cents.

The prices of some varieties may change as the season advances. Customers pay transportation charges.

## FIELD CORN (56 lbs. to bushel)

All grown especially for seed

## FLINT VARIETIES Qt. Pk. Bus.


Canada Smut-Nose. Yellow flint.......................................................... 20 . $855_{50}$
Compton's Early Flint. Small grain; yellow; I2-rowed; large; white cob................. 20 . $90 \quad 275$
King Philip. Early; reddish yellow flint.
$85 \quad 250$
North Dakota Flint. White; 8-rowed; very early......................................... 20 . 85 . 250
Canada Early Yellow. Very early; yellow flint...........Ears 5 cts. each, $\$ 3.50$ per Ioo.. $20 \quad 85 \quad 250$
Sanford, or Long White Flint. Large; 8-rowed............................................... . . . .
Large Yellow Flint. Deep yellow grains; medium early..................................... 20
Wit. Doep yan
Large White Flint. Long, slim ears; pure white grain....................................... 20 . $85{ }_{5}{ }_{2} 50$
Longfellow (Yellow Flint). Small cob and large grain................................... $20 \quad 85250$
White Australian. Early; white flint................................................... 20 . $80 \quad 25$

## DENT VARIETIES

|  |  | 80 |  |
| :---: | :---: | :---: | :---: |
| Chester County Mammoth. Medium-sized, yellow grains; very large ears; lat | 20 | 80 | 25 |
| Golden Beauty. Large grain; small cob; long ears; mediu | 20 | 85 |  |
| Golden Dent Early. Bright yellow grais | 20 |  |  |
| Hickory King. Large grain; small cob; white dent; ripens in about 120 days | 20 |  |  |
| Iowa Gold Mine. Dent; deep grain; ripens in about 90 days | 15 | 75 |  |
| Iowa Silver Mine. Large grain, dent; white cob; ripens in 100 days | 15 |  |  |
| King of the Earlies Yellow Dent | 20 |  |  |
| Leaming Early. Large, deep grains; dull yellow; early and | 20 |  |  |
| Legal Tender. Large; comparatively early |  |  |  |
| Mastodon. Early; strong-growing; large ears and grains; very prod | 20 |  |  |
| Minnesota King. Yellow; one-half dent and one-half flint; 8-rowed; medi very early |  |  |  |
| Pride of the North. Very large ears; deep grains; earliest | 20 |  |  |
| White Cap Yellow Dent. Good-sized ears; early | 20 |  |  |
| Wisconsin White Dent. Very early; deep-rooted; stands drought | $20$ |  |  |

## FODDER AND ENSILAGE VARIETIES



POP CORN (Shelled)
White Rice, White Pearl, Golden Queen. Each, qt. 25 cts., $1 / 2$ pk. 75 cts., pk. $\$$ r.25.

## MISCELLANEOUS CEREALS

All subject to change in price

| BARLEY ( 48 lbs. to bushel). 2 bushels to a Champion | $\stackrel{\text { Bus. }}{\text { But }} \text { \$I } 50$ |
| :---: | :---: |
| BUCKWHEAT ( 48 lbs . to bus.) 2 bus. to acre. |  |
| American Silver Hull. Early . | . About 200 |
| Japan. Productive; large grains | About I $5^{0}$ |
| LET ( 50 lbs . to the bushel). | Lb. Ioo lbs. |



MAMMOTH WINTER RYE

## MISCELLANEOUS CEREALS, continued

Millet, Hungarian. I to $11 / 2$ bushels Lb. 100 lbs . to acre . . . . . . . . $\$ 2.50$ per bus. .
White French. White grain........ \$0 12 \$8 00
Golden. Extra-large seed-heads. I 1/2
bushels to the acre. ................. Io 500
Pearl. Southern fodder-plant....... I5 900
Siberian
12600
OATS ( 32 lbs. to the bushel). 2 to 3
bushels to the acre.
Sensation.
Qt. Bus.
White Tartar
\$O I5 \$I 50
I5 I 25
RYE ( 56 lbs. to the bushel). $I 1 / 2$ to 2
bushels to the acre.
Spring Rye.
20 I 75
Winter Excelsior. Long, stiff straw. Sow $11 / 2$ bushels to the acre 15 I 50
Mammoth Winter. Maximum crop, 50 bushels of grain and 3 tons of straw per acre
$20 \quad 200$
WHEAT, WINTER ( 60 lbs . to the bushel). I $1 / 2$ bushels to the acre.
Rupert's Giant. Bald; red grain.... $20 \quad 200$
Durum. The best for macaroni. .... $25 \quad 275$
Red Wave. Beardless.
Klondyke. White grain; bald
$20 \quad 2 \quad 25$
Spring Wheat.
$20 \quad 200$

## FORAGE, ECONOMICAL AND MISCELLANEOUS SEEDS

Except where noted, these seeds are not sold in packets. From 10 cts. to 25 cts . worth is the smallest quantity put up. All subject to change in price

ASPERULA odorata (Waldmeister). Perennial, growing only about 6 inches high, with very fragrant flowers. In Germany it is thought much of as imparting a certain bouquet to Rhine wine, making the well-known Maitrank. Per pkt., IO cts.; per oz., 60 cts .
ASTRAGALUS sinicus (Milk Vetch, or Chinese Clover). Largely grown in Japan for feeding cattle and as a fertilizer for rice fields. It is a vigorous-growing, clover-like plant, having a profusion of red and white flowers. Per oz., io cts.; per lb., 50 cts .
AUSTRALIAN SALT BUSH (Atriplex semibaccata). Thrives in soils on which nothing else will grow, and it is highly recommended for alkali soils and all regions subject to periodical drought. It is very nutritious, and good for all kinds of live-stock. Two or three pounds of seed are sufficient for an acre. The seed may be sown in beds, and the seedlings planted out when 2 inches high, 3 feet apart. Grows strong and vigorously in the driest seasons. Per oz., I5c.; per lb., \$I.25; per ioo lbs., \$90.
BEANS ( 60 lbs . to the bushel)-
Velvet Bean (Dolichos multiflorus). Used in the South as a forage plant, and as a fertilizer plant for turning under. Stock readily eat the vines and leaves, and the Beans, when ground with or without the pod, are used in place of oats or corn, or mixed with them. Plant in rows 4 feet apart and I foot in the row, 2 or 3 beans in a place, as soon as danger of frost is past. The vines are vigorous in growth and rapidly cover the ground, bearing immense quantities of Beans. Per qt., 25 cts.; per bus., $\$ 4.50$.

Common English Horse Bean. Per qt., 25 cts.; per bus., $\$ 5$.
Soja Bean (Glycine hispida). Thrives well in hot and dry weather. Valuable for the South. Plant at the rate of $1 / 2$ to $3 / 4$ bushel to the acre, in drills $21 / 2$ or 3 feet apart, and cultivate same as field corn. It does not make good hay, but is good as ensilage or green fodder.
Yellow, Southern. Per qt., 20 cts.; per bus., \$3. BEGGARWEED (Florida or Giant Beggarweed; Desmodium tortuosum). An erect leguminous annual, growing from 3 to 8 feet high, with abundant foliage, valuable as forage or for soil renovation in subtropical regions; it also makes hay of a fine quality. It should be sown at the rate of 10 pounds to the acre, after the ground is warm and moist. The seed should be but very lightly covered. If for hay, it should be cut just as it begins to bloom. Per lb., 35 cts.; per 100 lbs ., $\$ 30$.
BERSEEM. See under Clover, page 64.
BROOM CORN (Sorghum vulgare), (I2 quarts to the acre.) Broom Corn succeeds in a good, deep soil, fresh but not damp; very sensitive to cold.
Long-Brush Evergreen. Per lb., I5 cts.; per Ioo lbs., \$7.
Improved Dwarf. Per lb., 15 cts.; per 100 lbs ., \$7.
California Golden Long-Brush. Grows from 12 to 14 feet high. Per lb., I5c.; 100 lbs., $\$ 7.50$.
BROOM, Scotch (Genista scoparia). The young growth of this shrub is chiefly valuable as food for sheep and other animals in winter. It is also employed for the making of coarse brooms. Per oz., 10 cts ; per lb., 60 cts .

BURNET, Common Field (Poterium sanguisorba). Perennial; makes excellent pasture for sheep; grows on the poorest ground-on dry, sandy or calcareous soils; resists the extremes of heat and cold. Sow in April, and again in September, with sainfoin, clover, rye, grass, etc., 30 lbs. to the acre. Per lb., 50 cts.; per Ioo lbs., \$45.
CATERPILLARS (Scorpiurus). A curious plant; of interest only on account of the peculiar fruits from which its name is derived. Amusement is caused by mixing them in salads. Per pkt., 5 cts.; per oz., 40 cts.
CHICORY, Large-rooted (Cichorium Intybus). When the roots are dried, roasted and ground they become the Chicory of commerce, and are used in adulterating coffee. Per oz., 15 cts.; per lb., $\$ \mathrm{I} .50$.
COTTON (Gossypium), Upland Big Boll. Very prolific. Per lb., 18 cts.; per 100 lbs., \$12.
Sea Island. Per lb., 20 cts.; per 100 lbs. , $\$ 13$.
COWPEAS (Vigna Catjang). Specially adapted to warm countries; extensively grown in our Southern States; also valuable in this latitude as a fodder-plant; their chief value, however, is as a green crop to plow under. The seed should not be sown till the ground has become well warmed. I bushel to the acre, in drills; 2 or $21 / 2$ bushels to the acre if sown broadcast.
Black. Per qt., 20 cts.; per bus., $\$ 3$.50.
Black-eyed. Per qt., 20 cts.; per bus., $\$ 4$.
Clay. Per qt., 20 cts.; per bus., $\$ 3.50$.
New Era. Per qt., 20 cts.; per bus., $\$ 3.75$.
Whippoorwill. Per qt., 20 cts.; per bus., $\$ 3.50$.

EMMER. (Sometimes advertised as "Speltz," though this name is incorrect, the true Speltz being a different article.) It is grown quite extensively in the Northwest, having been brought by the Germans from Russia, where it is considered a valuable cereal on account of its hardiness and drought-resisting qualities. Per lb., 15 cts.; per Ioo lbs., $\$ 8$.
ESPARTO GRASS (Stipa tenacissima). This is the true Esparto Grass, extensively grown in Spain and other parts of the Mediterranean countries for making rope, etc. Per pkt., 15 cts.; per oz., \$1.
ESPARSETTE. See Onobrychis sativa.
FENUGREEK (Trigonella fanum-grœcum). Annual. This seed is often sought by hostlers to give temporary fire and vigor to their horses. It is frequently given to oxen and pigs when fattening, causing them to drink and digest their food. Considered to be good for soiling when green. Per oz., io cts.; per lb., 25 cts.
FLAT PEAS. See Lathyrus sylvestris, below.
FURZE (Ulex europœa). Also known as Whin and Gorse. A perennial leguminous shrub. The crushed sprigs of one year's growth of this shrub furnish an excellent green fodder in winter. It grows well on barren hillsides and in sandy soil. Sheep are fond of it. 25 lbs. to the acre. Per oz., 20 cts.; per lb., $\$$ r. 50.
HOP SEED (Humulus lupulus). Per pkt., io cts.; per oz., 60 cts.
JERSEY WINTER KALE, or Cow Cabbage. For feeding cattle; very hardy. Per pkt., 5 cts.; per oz., Io cts.; per $1 / 4 \mathrm{lb}$., 25 cts.; per lb., 75 cts.


FIELD OF SOJA (SOY) beans

JERUSALEM CORN. See Sorghum, page 69
JUTE (Corchorus). Annual. Thrives in any good corn ground. Sow in drills, about 8 inches apart, 4 pounds to the acre. Requires no cultivation, as it will outstrip in growth all weeds. May be also sown broadcast, 6 or 7 pounds to the acre. Per oz., Io cts.; per lb., 50 cts.
KAFFIR CORN. See Sorghum, page 69.
KIDNEY VETCH, or Sand Clover. See Clovers, page 64.
LIQUORICE (Glycyrrhiza glabra). Seed in pods, per oz., 40 cts.
LOTUS corniculatus (Bird's-foot Trefoil). Perennial; used in pastures. Cattle and sheep eat it readily, and it is said to be quite nutritious. It grows on the lightest and most sterile soils, and can withstand severe droughts. Is excellent for sowing in mixture for dry pastures. Per lb., 75 cts.
villosus, or major (Greater Bird's-foot Trefoil). Per lb., 75 cts.
LUPINE, Yellow. Succeeds well in the poorest soil, and is exceedingly valuable for plowing in to improve sandy soils. It makes good forage, either green or as hay. The seeds are very fattening when used with hay. Sow in the spring when the ground has become warm, at rate of 90 lbs . to the acre. Per lb., 15 cts ; per 100 lbs ., \$6.
White (Large Flat Seed). One of the best plants known for green manure, as it gathers large quantities of nitrogen from the air. It may be sown from April to July, and plowed under when in flower. The seed, when burned, is excellent manure for orange and olive trees. Per lb., I5 cts.; per 100 lbs., $\$ 7$.
Blue. Used for the same purpose as the white variety. Per lb., I5 cts.; per $100 \mathrm{lbs} ., \$ 6$.
MADDER (Rubia tinctoria). A perennial, the roots of which, when dried and reduced to powder, furnish a red coloring matter. Per oz., 20 cts.; per lb., \$I.50.
MILLETS. See Cereals, page 65 .
MILLO MAIZE. See Sorghum, Branching, page 69.
ONOBRYCHIS sativa (French, Sainfoin; German, Esparsette). A perennial leguminous plant, belonging to the same family as clover and lucerne. It is a valuable plant for growing on poor land and barren hillsides. When once well established, it lasts for many years. If to be used for hay, cut just before the flowering period. Sow in spring, covering the seeds quite deeply, at rate of 80 lbs . to 100 lbs . to the acre. Per lb., i5 cts.; per ioo lbs., \$I2.
OSAGE ORANGE (Maclura aurantica). Useful for hedges. Per oz., 10 cts.; per lb., 50 cts.; 25 lbs . and up at 40 cts. per lb.
PEARL MILLET (Penicillaria spicata). A valuable fodder-plant for the South; is enormously productive. Sow the seed in drills 18 inches apart and 8 to 10 pounds to the acre. Per lb ., I 5 cts.; per ioo lbs., $\$ 9$.
PEAS, Canadian Field. Valuable for northern climates, for cattle-feeding, especially for milch cows. It also makes fine ensilage. It is sown broadcast in the spring and harrowed in. If sown with oats, about $11 / 2$ bushels to the acre; in drills, 2 to 3 bushels to the acre. Per qt., 20 cts . per bus., $\$ 3.50$.
PENICILLARIA spicata. See Pearl Millet above.

POPPY, Opium (Papaver somniferum). The seed furnishes an agreeable sweet oil, used for the table, also for painting and for illuminating. May be sown in spring, either broadcast or in drills, covering thinly. Also cultivated for opium. Per pkt., 5 cts.; per oz., 20 cts.; per lb., 75 cts.
POLYGONUM sachalinense (Sacaline). Hardy perennial, native of the island of Saghalin, between Japan and Siberia. It grows well on the poorest soils, and endures the extremes of heat and cold. Reaches a height of 10 to 12 feet, and can be cut two or three times in the season. The stems and leaves, which are very nutritious, are eaten either green or dry by cattle and sheep, and much relished. Clean seed, per oz., 25 cts.; per lb., \$2.50.
RAMIE, Silver China Grass (Urtica nivea). Extensively cultivated for its fiber. The seed should be germinated on cotton floating in lukewarm water, and transferred to a bed, screened from the hot sun. When the plants are 4 inches high, transplant to a field in rows 4 feet apart each way; when 3 feet high, turn them over and peg down, covering with earth, and they will start in every direction. Per pkt., I5 cts.; per oz., 85 cts.; per lb., \$io.
RAPE, Dwarf Essex English (Brassica napus). Largely grown in the northern United States, and in Canada. It is excellent for sheep-pasture, and also for soiling. It may be sown in May, and will be ready for pasturing in July and August; or, it may be sown in June or July, and yet furnish a large amount of pasture or fodder. In drills, sow 5 pounds to the acre; sown broadcast, IO pounds to the acre. Per lb., io cts.; per 100 lbs., \$8.
REANA luxurians (Teosinte). Short crop. A valuable fodder-plant from Central America, in growth resembling Indian corn. Well adapted to our Southern States. Per oz., I5 cts.; per lb. 75 cts.
RICE SEED, for sowing. Best Carolina. Per lb., 10 cts.; per $100 \mathrm{lbs} ., \$ 8$.
SAINFOIN. See Onobrychis.
SALT BUSH. See Australian Salt Bush, page 66.
SACALINE. See Polygonum sachalinense, above.
SERADELLA (Ornithopus sativus). A valuable forage-plant, admitting of one, and sometimes two cuttings, in one season. It succeeds well in a dry, sandy soil and furnishes a good pasture for sheep. It may also be cured for hay. Can be sown with winter rye. About 50 pounds to the acre. Per lb., 18 cts.; per 100 lbs ., \$I2.
SNAILS (Medicago scutellata). Used in the same way as Caterpillars. Per pkt., 5 cts.; per oz., 40 c .
SORGHUM. Twenty-five pounds required to the acre if sown in drills. For dry fodder two bushels should be sown to the acre.
Shallu. A non-saccharine Sorghum from India, also known as Egyptian wheat. Requires more room to develop than ordinary Sorghum, and consequently needs less seed to sow an acre. Per lb., 15 cts.; per ioo lbs., $\$ 9$.
Early Amber Sugar Cane. Ripens wherever Indian corn matures. Grows 10 to 12 feet high. Per lb., I 5 cts.; per ioo lbs., $\$ 8$.
Early Orange Sugar Cane. Ripens about ten days after Early Amber, and is said to produce a larger crop. Per lb., i5c.; per Ioo lbs., $\$ 8$.


WINTER OR HAIRY VETCH

Sorghum, Yellow Branching ( Yellow Millo Maize). Non-saccharine; useful for the large amount of foliage, green feed or cured fodder that it furnishes and for its grain. Per lb., I5 cts.; per 100 lbs ., \$7.50.
Red Kaffir Corn, or Sorghum. Non-saccharine. The plant is low, stalky, perfectly erect. The whole stalk, as well as the blades, cures into excellent fodder, and in all stages it is available for green feed. Per lb., 15c.; per ioo lbs., $\$ 8$.
White Kaffir Corn. Per lb., 15 cts.; 100 lbs., $\$ 8$.
Jerusalem Corn (White Dhoura). Per lb., 18 cts.; 100 lbs., $\$ 12$.
White Dhoura Corn. See Jerusalem Corn above.
Halepense (Johnson Grass). One of the most valuable southern fodder plants. On rich soils it may be cut three or four times in a single season, and it is claimed that hay made from it is equal in value to timothy. Sow in August and September, 35 to 40 pounds to the acre. Per lb., 20 cts .; per ioo lbs., \$18.
SPELTZ. See Emmer, page 67.
SPURRY (Spergula arvensis). Annual. Grows well on poor, dry, sandy soil; may be sown every month from March to August. Excellent pasture for cattle and sheep; also of much value as a fertilizer for light soil. I5 pounds to the acre. Per lb., 15 cts.; per ioo lbs., $\$ 8$.
Giant Spurry. Per lb., 15 cts.; per ioo lbs., $\$ 8.50$.

TEOSINTE. See Reana luxurians, page 68.
TOBACCO SEED. See page 53.
ULEX europæa. See Furze, page 67.
VELVET BEAN. See page 66.
VETCHES, Spring Tares (Vicia sativa). Sown broadcast at rate of 60 to 100 pounds to the acre, like wheat or barley, and sometimes mixed with oats for soiling. Used in France and Canada as a substitute for peas. Price variable. Present quotation, per lb., io cts.; per ioo lbs., $\$ 5.50$.
Sand, Winter or Hairy Vetch (Vicia villosa). Thrives on poor, arid, sandy soils. It may be sown either in fall or in spring, mixed with rye, for a support. Grows 3 to 4 feet high, and can be cut as soon as the bloom appears, and again for the seed. Perfectly hardy. Sow from 30 to 50 lbs . to the acre. Price variable. Present quotation, per lb., I5c.; per 100 lbs., $\$ 12$.
WALDMEISTER. See Asperula odorata, page 66.
WORMS (Astragalus hamosus). Used the same as Snails and Caterpillars. Per pkt., 5 cts.; per oz., 40 cts.
FARMOGERM. Nitro-gathering bacteria for Cowpeas, Soja Beans, Vetches, etc. Acre bottle, $\$ 2$; 5 -acre bottle, $\$ 9$.

[^5]
## Tree and Shrub Seeds

To preserve seeds of Conifers and other Evergreen Trees, it is best to keep them in perfectly dry sand until the time of sowing. For this latitude, the seeds should be sown thinly, as early in the spring as the ground can be worked, in beds of fine, sandy loam. Cover to the depth of about the thickness of the seed, and press the beds gently with the back of the spade to firm the earth around the seeds. Great care must be taken not to give too much water, as the young plants damp off very easily. Water with a very fine rose, but never so that the ground becomes soggy. Some shade must be used to protect the young plants from the hot sun and winds, and to keep the birds from destroying them. Seeds of the rarer sorts may be sown in coldframes or boxes; if in coldframes, the sashes should be shaded and the frames raised at the corners 3 or 4 inches, to allow the air to circulate freely. Keep the young plants well weeded, and allow them to remain one or two years before transplanting.

The propagation of Deciduous Trees from seed is less difficult than that of Evergreen species. Acorns, Hickorynuts, Chestnuts and Walnuts should be planted in autumn, or kept during the winter in earth or moss. They shrivel up by too-long exposure to the air, and many of them lose their vitality. Those seeds with hard shells, like the Locust, Gymnocladus, etc., should be planted in autumn or placed in boxes with sand, and exposed to frost before planting. They may not germinate till the second year after planting, and if they are received too late in the spring to expose them to the action of the frost, they may be put into a vessel of hot water for an hour or so before planting. American Elm, Silver Maple and a few other sorts ripen their seeds early in summer, and, if gathered and planted soon after they fall from the tree, will make fine plants the same season. The seeds of other Deciduous Trees and Shrubs should be planted from the middle of April to the middle of May, in drills about 2 feet apart, and covered about $1 / 2$ inch in depth, according to size.

Some of the varieties here offered are on hand now; many are due from foreign countries, where they are being collected for us. We are, of course, uncertain of getting all of them. As the season advances, many sorts become worthless from various causes, or are sold out, and cannot be replaced until the new crop is ready next season.

## EVERGREEN TREE AND SHRUB SEEDS

We do not sell Tree or Shrub Seeds in quantities of less than an ounce of any one variety, except those quoted at over 25 cents per ounce; of these, 25 -cent packets may be ordered


## EVERGREEN TREE AND SHRUB SEEDS, continued



## DECIDUOUS TREE AND SHRUB SEEDS

We do not sell tree or shrub seeds in quantities of less than an ounce of any one variety, except those quoted at over 25 cents per ounce; of these, 25-cent packets may be ordered


## DECIDUOUS TREE AND SHRUB SEEDS, continued



## DECIDUOUS TREE AND SHRUB SEEDS, continued



Spartium scoparia. See Genista. Spiræa
salicifolia (American Meadow Sweet)\$0 10 \$0 85
tomentosa (Hardhack)................ 10 ..... 85
Staphylea pinnata (Eu. Bladder Nut). .. 15 ..... I 25
Styrax japonica. ..... 50
Syringa vulgaris (Lilac). Clean seed. ..... 50
Taxodium distichum (Deciduous Cy - press)................................
Tecoma radicans (Trumpet Creeper) .... $20 \quad 200$ ..... oo
Thea chinensis (Chinese Tea). ..... 85
Tilia argentea (Silver-leaved Linden) ..... 50
americana (American Basswood). ..... 75
europæa (European Linden).
grandiflora (Large-leaved Linden)...... io io oo ..... оо
Ulex europæa (Furze, Gorse or Whin)..
Ulmus campestris (Common Elm). ..... oo
americana (American White Elm). ..... 75
montana (Large-leaved Elm) ..... oo
fulva (Slippery Elm)... ..... 50
Vaccinium arboreum (Sparkleberry) ..... oo
atrococcum (Black High Blueberry) ..... oo
corymbosum (Swamp Blueberry) .. ..... oo
pallidum (Pale-flowered Whortle-berry) ..... oo
pennsylvanicum (Low Early Blueberry)
vacillans (Low Blueberry) ..... oo$\begin{array}{cccccc}\text { Viburnum acerifolium (Dockmackie)..... } & \text { I5 } & \text { I } & 25 \\ \text { cassinoides (Appalachian Tea Tree).... } & \text { I5 } & \text { I } & 25\end{array}$
25
dentatum (American Arrow-wood) ..... 80
lantana (Wayfaring Tree)
85
85
Lentago (Sheepberry) ..... 150
Opulus (Snowball) ..... 85
prunifolium (Black Haw) ..... 85
Tinus (Laurestinus) ..... 15 I 25
Vitex Agnus-castus (Chaste Tree). ..... oo
Walnuts. See Juglans.
Wistaria
chinensis (Chinese Wistaria) ..... $40 \quad 4$ oochinensis alba (White Chinese Wistaria) $70 \quad 700$
Zizyphus sativa (Cultivated Jujube) ..... $20 \quad 200$

## FRUIT SEEDS

| Apple Seed, American. | Per oz. Lb. <br> \$0 IO \$0 40 |  | 100 lbs . |
| :---: | :---: | :---: | :---: |
|  |  |  |  |
| Apple, Paradise (Pyrus para- |  |  |  |
| disiaca) | 10 | 60 |  |
| Apricot Pits. |  | 35 | \$30 00 |
| Cherry Pits, Mahaleb |  | 60 | 5500 |
| Black Mazzard. |  | 30 | 2500 |
| Domestic. |  | 35 | 3000 |
| Currant, Black.... . pkt., IOC | 25 | 250 |  |
| Red Dutch...... " 5c. | 20 | 200 |  |
| White Dutch... " 5c. | 20 | 200 |  |
| Gooseberry, Green |  |  |  |
| Large Red...... " roc. | 30 |  |  |
| Peach Pits, Natural qt., I5 cts.; bus., $\$ 2.50$ |  |  |  |
| Pear Seed................. | 25 | 250 |  |



## SEEDS OF HEDGE PLANTS

For prices, see under head of Tree Seeds

| Barberry, Common | is. |
| :---: | :---: |
| Purple-leaved | Berberis folio-purpurea. |
| Japanese | Berberis Thunbergi. |
| Broom, Scotch | Genista scoparia. |
| Buckthorn | Rhamnus carthartica. |
| Furze, or Gorse | Ulex europæa. |
| Hawthorn. | Cratægus oxyacantha. |

Locust, Honey. . . . . . . . . . Gleditschia triacanthos.
Yellow.............. Robinia pseudacacia.
Norway Spruce. . . . . . . . . . Picea excelsa.
Osage Orange . . . . . . . . . . Maclura aurantiaca.
Privet, Japan or Calif..... Ligustrum japonicum.
Common Evergreen . . Ligustrum vulgare.
Sheepberry (Black Haw). Viburnum prunifolium.

# FLOWER SEEDS 

Practical Directions for Culture, Treatment, etc.

HARDY ANNUALS (hA).-Sow in April or May, according to the latitude, in shallow boxes or pots placed in a warm window, a hotbed, or, if possible, in a greenhouse. A second sowing ought to be made from two to four weeks after for a succession, as well as to provide against failure the first time. For sowing seeds in there is nothing better than shallow boxes from 2 to 3 inches deep, and of any convenient size. The most suitable soil for all the smaller kinds is a very fine, rich, sandy loam. That from old hotbeds is excellent, or sods from an old pasture piled up and allowed to rot for two or three years and then mixed with a little old stable manure and sand. After the seeds are up, care must be taken to give them plenty of air and moisture, yet not too much water, or they will "damp off." When the young plants are well out of the seed-leaf, they must be transplanted to new boxes. If pots 2 inches or more in diameter can be had, set out from three to a dozen or more of the young seedlings along the edges of the pot, so that as soon as the ground is warm enough they may be easily turned out and planted singly, as by that time they will have made good roots. When pots cannot be had, boxes, tin cans, etc., may be substituted.

A common mistake in sowing flower, as well as other seeds, is covering too deeply. As a general rule, cover only to the depth of the thickness of the seeds; or, with medium-sized seeds, like Balsams, Zinnias, etc., half an inch or so is none too much. Such fine seeds as Portulacas need only to be pressed into the soil with a piece of board or the palm of the hand. Always press the earth down firmly after sowing all flower seeds, else there is danger of their drying up before the roots can get firm hold of the soil. Seeds of the hardier Annuals may be sown where they are to grow; but, as a rule, it is preferable to transplant, as the plants are generally stronger and stand the drought better. During very dry weather, and when the seedlings are first set out, they should be watered frequently. Provide some support for all such Annuals as require it.

The weeds should be kept down and the ground loosened often, so that the plants will receive the full benefit of the rains and dews, which they will not if the ground is allowed to become hard and baked.

Seeds of Biennials and some Hardy Annuals may be sown in July and August in the open and in September in boxes and placed in coldframes. They will make strong plants by spring and flower early. Do not put on the sashes until heavy rains and frosts begin, and then always remove during the day whenever the temperature is above freezing in winter.

HARDY BIENNIALS ( $\mathbf{h B}$ ) and HARDY PERENNIALS ( hP ). -These require the same treatment as the Hardy Annuals. In addition to the above, both Hardy Biennials and Perennials may be sown in the open border from July to September; for, if not sown until spring, the seeds of many Perennials require several months, and some even as long as two years, before they germinate. In this case, it is a good plan, at the commencement of frost, to cover them lightly with straw, leaves or any dry litter, in order to afford some protection from the extreme severity of the winter. As soon as the frost is out in the spring, remove the covering and loosen the surface around the plants, which, when large enough, may be transplanted to the flower-garden where they are to remain. The seeds of some species of Hardy Perennials often lie in the ground for six or eight months before germinating, so that patience with them is often unexpectedly rewarded.

HALF-HARDY ANNUALS (hhA).-These may be sown in shallow boxes, pots, or a hotbed, as directed for Hardy Annuals. They may be sown thus at any time after the middle of April, as the hotbed will be sufficient protection; but it is best to cover the glass with a mat or straw at night until danger of frost is past. In the day give all the air possible. After the end of May, sow in the bonder, like Hardy Annuals.

HALF-HARDY BIENNIALS (hhB) and HALF-HARDY PERENNIALS (hhP) require the same treatment. Though plants and their blooms are greatly forwarded by sowing the seeds early in boxes under cover, it may be stated that nearly all kinds of Hardy and Half-Hardy flower seeds may be sown in the open border in a warm and sunny spot as soon as the soil has become dry and warm; so that those who have no glass frames or greenhouses need not be without flowers. They can have them, but it will be later.

TENDER ANNUALS, BIENNIALS and PERENNIALS.-The best method to obtain an early bloom of the Tender Annuals ( tA ), and to insure strength to the plants, is to sow the seeds in boxes or pots in March, placing them in a warm greenhouse or plunging in a moderate hotbed, carefully protecting them from the cold, shading from the midday sun, and watering with a fine rose. The seed should be sown in a very light, sandy compost, and the pots well drained by placing broken pots or bits of sod in the bottom. The finer seeds must not be covered more than an eighth of an inch deep and the soil pressed down closely over them. Water frequently, particularly if the house or hotbed is very warm. As soon as the plants are out of the seed-leaf, transplant them into shallow boxes or small pots, and when they have acquired sufficient strength, transplant into the flower-beds; not, however, before the middle of May.

GREENHOUSE SEEDS (g) should be sown as directed for Tender Annuals, in pans, pots or shallow boxes, and be kept in the house, carefully watched, slightly watered occasionally, and sheltered from the hot sun till strong enough to transplant. Most varieties may be sown at any season of the year.

The smaller seeds of Greenhouse Plants are sometimes difficult to make germinate unless great care be
taken in the mode of sowing. Hence, the supposition arises that the seed itself is not good, whereas the fault is not in the seed, but in the treatment. Fine seeds of this description should be sown in leaf-mold or peat, with some fine sand added to it; press firmly down in the seed-pan or pot, and make perfectly level at the top so that the mold may not afterward sink materially with watering. Sow the seed very thinly and cover very lightly with a little compost or with silver-sand. Success is more certain if a pane of glass is placed over the pan or box till the plants have appeared, when it should be removed. By this method the difficulty of starting fine seeds will be removed. As soon as the young plants have two leaves, they should be transplanted into similar compost in another pan or box. To do this, do not pull them out of the seedpan, but break up the soil by running a stick or trowel under it, when the plants can be taken out with good roots. After transplanting, they should be kept in a shady part of the greenhouse for a few days, and watered very sparingly.

There are many minute plants from the finer seeds killed by drenching with water while very young. One way to avoid this is to give it to them by dipping a clothes-brush in water, shaking off the greater part from the brush, and then (holding the brush over the seed-pan) drawing the hand over the bristles several times; this will cause the water to be thrown on the young plants almost like dew. In the first stage of their existence, plants require moisture in a minute quantity, often repeated, and not in such large quantities as to saturate the soil in which they are growing.

Primula Sinensis.-Sow the seeds in drills in a light, rich soil, in shallow boxes, at any time from the middle of March to the middle of May; the earliest-sown seed will naturally produce the earliest bloom. Cover the seeds about an eighth of an inch, and press the soil on them with a board or the bottom of a pot. Water moderately, avoid forcing the seed, and keep the young plants away from drip. The boxes may be placed in the greenhouse or out-of-doors in a frame. As soon as the plants are well out of the seed-leaf, transplant them singly into 2 - or $2 \frac{1}{2}$-inch pots, using a light, rich soil. The object now is to make good stocky plants, and they must, therefore, be repotted as often as the pots become tolerably filled with roots, until they are in 5 - or 6 -inch pots, when they may be allowed to flower. Previous to this, any flower-stalks that appear must be pinched out. In a suitable place, the plants will do better out-of-doors during summer. The plants will bloom continuously during the winter in either the greenhouse or a well-lighted room, not too warm; they should not be moved about often.

Cineraria.-This is a rather difficult plant to grow if its requirements are not understood. The mistake generally made is in growing it in a warm house instead of a cool one. The seed should be started in the greenhouse. For winter blooming, sow in April and May in shallow boxes, in fine soil; drop the seed in shallow drills, cover, and press the earth rather firmly with a piece of board or the bottom of a pot. Set the box where it will get the morning sun, but be free from drip; water moderately and carefully. The treatment of seedlings should be similar to that given to Primula Sinensis. As soon as the plants are out of the seed-leaf, transplant singly into small pots, in a rich soil with some vegetable mold in it. Repot as often as the pots become moderately filled with roots, or sufficiently often to prevent the roots from becoming pot-bound. If specimen plants are wanted, the repottings should be continued until the plants are in pots from 8 to 10 inches in diameter. The last two pottings should be liberal ones, and drainage well provided for, as the plants will need copious watering. When the flower-stalks appear, manure-water may be used once or twice a week. Aphis and red spider are to be guarded against; this is best done by frequent syringings or sprinklings overhead. The plants will do best during the summer out-of-doors, in some place where they will not get too much sun, and be free from the drip of trees. In the fall they should be placed in a cool greenhouse, where the temperature can be kept low and the air moist.

Calceolaria.-The seeds are very small, and should be sown on the surface of shallow boxes filled with a light, sandy soil which has been sifted. Sow moderately thick in rows on the surface and cover very lightly with sifted sphagnum moss, cocoanut waste, or very light soil. Press the soil firmly on the seed. The watering should be done carefully; an atomizer or brush is best. To retain the moisture, the box may be covered with panes of glass, which must be removed as soon as the plants appear, however. The box should have plenty of light, but not much sun. As soon as the plants can be handled, transplant singly into pots 2 to $21 / 2$ inches in diameter. The soil should be light and rich, and vegetable mold is an excellent addition. Repot as often as the pots are fairly filled with roots, and continue the repotting, if fine flowers are wanted, till the plants are in 8 -inch pots. If the plants become root-bound, they are apt to run prematurely into flower. Water regularly and abundantly to prevent drooping. As larger pots are used, drainage must be supplied to carry off the surplus water. Place in a cool greenhouse in the winter, and keep the pots apart to prevent the leaves from touching.

Pansy.-For spring blooming, the seed should be sown in August, September and October, in a coldframe with a southern aspect. Plenty of air and light is essential. During mild weather the sashes should be removed; when it is frosty, coverings are preferable to artificial heat. If wanted for winter bloom, sow in July and transplant in beds or benches near the glass in the greenhouse in a low and even temperature. The more expensive sorts and mixtures produce the largest and finest fowers.

Petunias.-Fill shallow boxes with fine, light soil, say an even mixture of leaf-mold and sand, and wet thoroughly by pouring on boiling water, which kills insects and heats the soil. When the soil has cooled sufficiently, but is still warm, sow the seeds very thinly in the boxes, so that the plants may be I inch apart; cover the seeds very slightly with sifted sand, and place slate or glass on top of the boxes. If the white root-points of germination appear before the leaves, sift on more sand, replace the slate, and watch closely. When the small leaves appear, remove slate and give plenty of light, to produce stocky plants. The soil may now need water, which should be applied very gently. Later the larger plants may be transplanted into other boxes or pots. As the weakest plants frequently give the finest blossoms, every plant should be preserved until the blossoms appear. For the magnificent large flowers the more expensive sorts should be ordered.

## Selected List of Flower Seeds

## OUR COMPLETE LIST OF FLOWER SEEDS BEGINS ON PAGE 113

We have unquestionably the largest assortment of Flower Seeds in America, and our strains are far superior to those commonly sold, often under fancy names and at fictitious prices. We avoid extravagant descriptions, meant only to effect sales.

## ASTER (Half-hardy Anvua) One of the best An-

The Aster is of easy culture and very popular. Plants from seed sown in the open ground in May bloom finely in September and October. For July and August flowers, sow in March or April in coldframe, spent hotbed, or in pots or boxes in the house. Cover the seeds about half an inch deep with rich, light soil, and, when the plants have three or four leaves, transplant about i8 inches apart each way into well-prepared beds. Manures too fresh or used in too large quantities sometimes induce disease in Asters. When used, they should be thoroughly well decayed and mixed with the soil. Small quantities of slaked lime or fresh wood-ashes stirred into the surface of the Aster beds form good tonics for the plants and keep disease and insects from the roots.

DWARF CHRYSANTHEMUM-FLOWERED.
Grows 10 to 12 inches high; large, chrysanthemum-like flowers.
50100 White ..... pkt., IO50110 Scarlet10
50120 Dark Blue ..... IO
50124 Light Blue ..... IO
50130 Carmine ..... IO
50134 Rose. ..... 10
50140 Mixed 1/4 oz., 75c., oz. \$2.50. ..... 10

TRUFFAUT'S PEONY PERFECTION. Grows stiffly erect and about 18 inches tall. Remarkable for the brilliant colors of its great, incurved flowers.
50180 Amethyst. ..... pkt., IO
50184 Sunbeam. Sulphur-yellow ..... 10
50190 Snow-White ..... 10
50194 Apple Blossom ..... IO
50200 Crimson ..... IO
50204 Scarlet ..... 10
50206 Rose ..... IO
50210 Light Blue ..... IO
50212 Dark Blue ..... IO
50214 Blood-Red ..... 10
50220 Mixed.. ..... $1 / 40$ oz., 75c., oz. $\$ 2.50$. . 10
DWARF NON PLUS UL
6 inches high; fine for borders.
50260 White ..... pkt., 10
50264 Rose ..... IO
50270 Crimson ..... 10
50274 Dark Blue ..... 10
50280 Mixed ..... 1/4oz. 60c., oz. \$2.. 10
VICTORIA, Dwarf. Plants bear from 10 to 20
beautifully reflexed flowers in pyramids of about 18 incheshigh. The best sort for pot culture.pkt., 10
50324 Rose ..... 
50328 Peach Blossom ..... IO
50330 Light Blue ..... 10
50334 Dark Blue ..... 10
50340 Dark Scarlet ..... IO
50344 Mixed $1 / 4$ oz. 75c., oz. \$2.50. ..... ı
VICTORIA, Tall. Large flowers, imbricated petals.
50380 White ..... pkt., 10
50390 Rose ..... IO
50394 Dark Scarlet ..... 10
50400 Light Blue ..... IO
50404 Peach Blossom ..... 10
50410 Dark Blue ..... Io
50414 Mixed ..... 1/4oz. 85c., oz. \$3.. IO
COMET, Half Dwarf. Petals wavily reflexed, curledand twisted; form flowers of extraordinary size and beauty.
50450 Rose ..... pkt., IO
50454 Carmine. ..... IO
50458 Brick-Color ..... 10
50460 Light Blue ..... 10
50464 Dark Blue ..... IO
50470 Snow-White ..... 10
50474 Peach Blossom ..... 10
50480 Crimson ..... IO
50484 Mixed. 1/4oz. 75c., oz. \$2.50. ..... 10
GOMET, Giant. Very large flowers.
IO
50494 Rose ..... 10
50500 Light Blue ..... 10
ASTER, continued
Comet, Giant, continued
50504 Dark Bluepkt., 10
50510 Crimson ..... 10
50514 Sulphur-Yellow ..... IO
50520 Mixed 1/4oz. 85c., oz. $\$ 3 \ldots$. 10
QUEEN OF THE MARKET. The best early Aster;of graceful, spreading habit. Height, $11 / 2 \mathrm{ft}$.50560 Whitepkt., 10
50564 Violet-Red ..... 10
50570 Crimson ..... Io
50574 Scarlet ..... ı
50580 Rose ..... 10
50584 Dark Blue ..... 10
50590 Light Blue ..... 10
50600 Mixed ..... $1 / 4$ oz. 4oc., oz. $\$ 1.25$. . 10
BALL, or JEWEL. Flowers long stemmed, quite
50640 Whitepkt., 10
50644 Apple Blossom ..... Io
50650 Crimson ..... Io
50654 Dark Blue ..... 10
50660 Light Blue$1 / 4$ oz. 85 c., oz. $\$ 3 \ldots$. 10
BRANCHING. Forms broad bushes, with large,long-petaled flowers, graceful and feathery in effect.
50700 Rosepkt., 10
50704 Crimson
50704 Crimson ..... ı
50706 Indigo-Blue ..... Io
50714 White ..... ı
50716 Pink ..... IO
50720 Dark Blue ..... IO
50724 Lavender ..... 10
50726 Lilac ..... 10
50730 Mixed $1 / 4 \mathrm{oz}$. 45c., oz. \$1.50.. 10
OSTRICH PLUME. Splendid class; fine for cutting.50810 Brick-Redpkt., 10
50820 Dark Blue ..... IO
50830 White ..... 10
50840 Rose. ..... 10
50850 Mixed $1 / 40$ z. 60 c., oz. $\$ 2 \ldots$... 10
HOHENZOLLERN. Valuable for cutting.
50900 White ..... 10
50910 Rose. ..... IO

## VARIOUS ASTERS

51100 CREGO, Pure White
1/4oz. 50c., oz. \$1.50, pkt. Io ..... 51110
Delicate Shell-Pink.$1 / 4$ oz. 50 c ., oz. \$1.50. 1о
Very early; on style of Queen of the Marketbut with larger flowers.
51130 MIGNON. Pure white.
5140 ..... 51160 LADY ASTER (Lady inWhite). Pure white. Io


GIANT COMET ASTER
Hohenzollern, continued
50920 Azure-Blue . . . . . . . . . . . . . . . . . . pkt., 10 50930 Mixed. $1 / 4$ oz. 75 c ., oz. \$2.50. . Io
RAY. Fine for cutting.
51010 White; 51020 Rose; 51030 Blue....
each, pkt., io
CHRISTMAS TREE. Very fine class.
51040 White . . . . . . . . . . . . . . . . . . . . . . . pkt., 10
51044 Crimson . . . . . . . . . . . . . . . . . . . . . . . . . .
Io
51050
Rose . . . . . . . . . . . . . . . . . . . . . . . .
51050 Rose0
51060 Blue ..... 10
51170 TRIUMPH. Scarlet.................pkt., 10
51190 White. ..... 10
51200 SNOWBALL. Pure white. ..... IO
51210 VICK'S BRANCHING CARMINE KING.
1/4oz. 45c., oz. \$I.50. . IO
51214 WALDERSEE. Rose. ..... 10
51220 Mixed German Quilled ..... oz. 60c... 5
51240 Mixed All Sorts. ..... 60c... 10
51230 Mixed Globe-flowered ..... " 60c... 10
51270 Single Annual, Mixed

## Collections of Choice Asters

These collections are put up by the famous German Aster-growers, and they contain only seed saved from the very finest plants. In each collection the colors are separate, the collection of 24 Victoria Prize, for instance, containing one packet each of 24 separate and distinct colors of that class.


## AGERATUM

For strengthening the garden's color-forces in blue, no annual is so good as the Ageratum. Though ordinarily used in bedding and borders, in contrast with such plants as geraniums, perillas, etc., the rose, white and blue sorts are exceedingly attractive, when mingled with alyssum, candytuft, etc. They grow well almost anywhere. The dwarf, blue sorts make fine borders. Sow under glass early in the season or, later, outdoors in a mellow seed-bed. Seeds sown in August will produce good plants for winter flowering.
52200 conspicuum. This and the next are tender perennials; sow early; flowers white; Ift . . ${ }^{1 / 40 \mathrm{oz} .}$ Pkt.
52210 Lasseauxi. Rose-colored clusters; Ifter pernals, sow early, howers white, ift 10
52220 mexicanum (hA). Blue. Parent stock of the hardy annuals below; i $1 / 2 \mathrm{ft} . \ldots \ldots . .$. . $\$ 0$ I5 5

52240 " Dwarf Blue. 9 in., fine for edgings. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 15 . 5
52250 "" "White. Pretty for contrasts; 9 in.; fine for edgings. ............. I $\quad$. 5
52254 " " White, Large-flowered. Splendid....................................... 20 Io
52260 " Imperial Dwarf Blue. Excellent for edgings; 9 in......................... I5 . 5
52270 " " White. Excellent for edgings; 9 in......................... I 15
52280 "Little Dorrit. Azure-blue. Plants 6 inches high, I foot across........... I5 5
52284 " " " Yellow. Distinct ............................................. 15 . 5
52290 " Little Blue Star. Bright blue flowers; fine for carpet-bedding; 5 in........ 25

52310 " Blue Perfection. A very fine dwarf; 9 in.; splendid. . . . . . . . . . . . . . . . . . . 25 Io
52320 " Princess Victoria Louise. Dwarf; light blue, white center................ 20 Io
52330 " Mixed. All annual varieties ............................................. 25c... . 5

## ALYSSUM

For borders, baskets, pots, rockwork and for cutting. In borders, sow thickly, so as to form masses, early in spring or even the previous autumn. For winter bloom, sow late in August, and thin the seedlings to about a dozen for a good-sized basket. Cut back after the first flowers fade and others will come. 52500 maritimum (Sweet Alyssum). (hA). Fragrant white flowers all summer............. . \$0 30 \$0 o5 52510 " compactum, Little Gem. Grows erect; 6 in..................... $1 / 4 \mathrm{oz}$. 20c... Io


LONG-SPURRED AQUILEGIA

52520 " Thorburn's Bouquet. Very dwarf and compact; for pots $1 / 40 \mathrm{zz}$. and borders; 3 in. \$o $5^{\circ}$ procumbens, White Carpet. Of trailing habit; flowers profusely.............
52540 saxatile compactum (Gold Dust). (hP). Single plants cover a square foot in a year and produce hundreds of yellow flowerheads. Grayish foliage; I $\mathrm{ft} \ldots$. 155

52550 argenteum. Similar to the above, but dwarfer; 6 in. $\qquad$ı

## AQUILEGIA (Columbine) (Hardy Perennial)

A most desirable border plant. It forms large clumps, blooms early, long and abundantly, is useful for cutting and elegant in habit. Sow seed in the open ground in spring, preferably where the plants are to grow, and thin to about a foot apart. Sow in the fall for flowering the following season. They thrive well under ordinary garden culture, but such rare sorts as $A$. cerulea and $A$. chrysantha do best in partially shaded, well-drained nooks. Few hardy perennials are so easily grown from seed.
52850 californica hybrida. Orange-red and yellow............................pkt., 52900 canadensis. Scarlet and yellow; for shade. pkt., 10 52910 caryophylloides fl. pl. Double. Oddly striped with red and white; $11 / 2 \mathrm{ft} . \ldots .25$ 52920 chrysantha. Golden yellow; flowers large, long spurred; 3 ft .
AQUILEGIA, continued
52930 cœrulea (Rocky Mountain Blue Columbine). One of the most beautiful of our native flowers. Sepals deep blue, petals white; 3 ft .pkt., 15 hybrida. Large-flowered, long-spurred 52960 Jætschaui. Large flowered, yellow; long, red spurs. Io ........................ 52970 flabellata nana alba. White flowers; early; ift.... I5 52980 glandulosa vera. One of the handsomest hardy perennials; stems 2 feet high, with sometimes 50 to 80 blossoms 3 inches in diameter, of the deepest blue, with white corolla; a splendid flower25
52990 truncata. Dwarf; scarlet and yellow; I ft. ..... 15
53000 Skinneri (Mexican Columbine). Very handsomeand quite distinct; spurs and sepals long, crimsonand light green; 3 ft .25
53010 Long-spurred Hybrids, Mrs. Scott Elliott's Strain.Magnificent hybrids. 25
53020 vulgaris, Double White. Showy and lasting; 2 ft .$1 / 4 \mathrm{oz}$. 20c... 10
53030 " " Mixed. Best colors...oz. 30c.. .


DOUble balsam

## CALENDULA

Hardy annuals about a foot high. The seed may be sown in the open ground early in spring, and the plants will bloom early in summer, and continue until late in autumn. The flowers exhibit every shade of yellow from ivory to deep orange, are produced in great profusion, and are strongly effective in beds, borders or backgrounds. The dried flowers are sometimes used for flavoring soups and stews.


See also Marigold, pages 93 and 94

## CALLIOPSIS

This annual is another of the garden's great forces in yellow, strengthened with rich red-maroons and browns. Sow in the open ground in spring, and, in thinning or transplanting, give the plants plenty of room to spread. Their tall, slender habit makes neat staking and tying necessary. Fine for cutting. Oz. Pkt.
54310 bicolor (tinctoria). Yellow-brown. 2 feet............................................. . . 25 \$o oz
54320 " nana radiata (Ray of Gold). 6 to 8 in . Golden yellow flowers with dark purplish

$$
\text { brown centers. Profuse bloomer. .... . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . } 25
$$


54350 hybrida superba. Very showy hybrids in great variety................1/40z., 20c... Io


54380 Drummondii (Golden Wave). Gold and brown; I ft.................................... . . . . . . 25
5

5
54410 Mixed Annual Sorts. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 20 5
54450 Collection of Calliopsis, including io varieties. 40


CAMPANULA (CANTERBURY BELLS)

## COREOPSIS

54560 grandiflora (hP). Large flowers of rich yellow; 2 ft . $1 / 4 \mathrm{oz} .25$ cts., pkt. IO cts.

## 54570 lanceolata grandiflora (hP)

 Large, golden yellow flowers; fine for cutting. $1 / 4 \mathrm{Oz}$. 25 cts., pkt. IO cts.54580 lanceolata, California Sunbeams (hP). Flowers very large, in a great variety of beautiful forms and various shades of yellow and brown; I ft. $1 / 40 \mathrm{Oz} .25 \mathrm{cts}$., pkt. Io cts.

## CAMPANULA

## (Canterbury Bells)

These fine old plants are rich in color, profuse in bloom, and of easy culture. For outdoor effects, when planted in quantity, they are glorious, and finest full-bloom specimens of such varieties as $C$ : calycanthema can be transplanted to pots for house decoration by soaking the soil about them with water and lifting with a ball of earth. Sow seeds of biennials outdoors early in July and thin or transplant to temporary quarters until October. Transplant, then, 6 or 8 inches apart, in a coldframe, where they will make large plants by spring. They are as easily cared for as pansies. The old practice of covering Canterbury Bells with leaves through winter is not satisfactory. Transplant in spring, 18 to 20 inches apart, in beds where they are to bloom. In June and July they flower most profusely, and are in fine form a long time. They also make beautiful potplants for Easter. If sown early in good soil, the hardy perennials will bloom early the next year. All the varieties like a rich, sandy soil with good drainage.

54730 " " alba. A white-flowered variety of the above..................... 15

54830 pyramidalis (Chimney Bellfower) (hhP). Spikes 3 to 4 ft . tall, erect, pyramidal; flowers large and of a beautiful blue; blooms in late summer and autumn ...... 1/4oz. 25c... 10
54840 " alba. White ....1/40z. 25c... 10

54850 grandiflora Mariesii (hP). A fine, dwarf, dark blue variety, growing I foot high. Dwarf habit; rarely exceeds 3 feet in height; bright blue flowers 3 to 5 inches across; lives eight to ten years.

# 54870 Vidali (gP). White; very floriferous. 2 ft . 



CELOSIA, OSTRICH FEATHER

## CELOSIA PLUMOSA

## (tA)

Beautiful foliage plants blooming in late summer and autumn, and producing large, showy plumes, curled and curved, much resembling ostrich feathers. See illustration.
54950 Ostrich Feather, Crimson..... pkt., Io 54960 "" " Orange............ Io 54980 PRIDE OF CASTLE GOULD. Of upright, compact growth, 2 to 3 feet high, with large, fine-feathered heads in many variations of shades and selfcolors; blood-red, carmine, deep scarlet, wine-red, salmon, yellow and orange. Valuable either as a pot-plant or for bedding in sunny situations. (Celosia cristala), see page 87

## CANDYTUFT (Iberis)

The Candytufts are among our best flowers for edgings, bedding, massing or rockeries, and for cutting. Several of the varieties are fragrant, and all are profuse in bloom. Sow outdoors in April, and thin well when the plants grow about an inch. Sow again in a month, and late in July for fall flowers. Give rich soil and water freely.

Oz. Pkt.
55000 affinis, Dwarf (hA). Neat and pretty bedder; 6 in................................... . $\$ 025$ \$0 05
55010 amara (hA). White; I ft. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
55020 coronaria (Rocket Candytuft) (hA). Of candelabra form; flowers in upright spikes.... 25 5
55030 " Empress. White. I ft......................................................... . . . . 25 . 5
55040 " Little Prince. Very large heads of pure white flowers. Fine for border and pots;
6 in.............. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 50
10
55050 " Giant Hyacinth-flowered. White. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 40 Io
55060 odorata (hA). Small, white, fragrant flowers. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 20 . 5
55070 umbellata (hA). Purple; r ft............... . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25 . 5

55090 " Dunnetti. Dark crimson; i ft.................................................... . . . . 25 . 5


55120 " Queen of Italy. Dwarf; erect; fine pink flowers; 6 in.......................... 40 Io
55130 " Dwarf Hybrids. Mixed colors; 6 in............................................. . . . . 50 Io
55140 Mixed Annual Sorts. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 20 . 5
55160 Collection of Candytuft. 6 varieties choicest annual sorts............................... . . . . 30
PERENNIAL CANDYTUFT. Hardy, evergreen plants, making a magnificent showing the second year from seed. They bloom very early, cushioning rock ledges, borders, etc., with banks of bloom. Sow outdoors in spring or fall in any sunny place.
55170 sempervirens. White flowers remain fresh nearly a month; r ft....................................... 15

55190 semperflorens. A handsome but somewhat delicate evergreen perennial, with large, pure white, sweet-scented flowers. Not suitable for border culture, though hardy enough to stand our winters when grown at the foot of a south wall or in a very sunny corner of the rock-garden... I


CANDYTUFT


THORBURN'S MARGARET CARNATIONS

## CARNATION

## (Dianthus Caryophyllus)

The splendid Carnation of the florist is a very interesting plant to grow from seed, and it is not overexacting. Sown under glass in early spring, or later in the open ground, the plants will flower finely the second summer. For largest, richest flowers, we recommend culture in pots of rich soil. With many they are also garden favorites, and, grown in this way, flowers of good quality may be enjoyed all summer if given plenty of water, good soil and a mulch about their roots. With tall varieties, staking and tying is necessary. Young plants are perfectly hardy outdoors, but when two or three years old they are injured by winter cold, so that sowings should be made every year. The more expensive sorts produce the finest flowers. The prices we quote, although seemingly high, are most reasonable for strains such as we offer.
MARGARET CARNATIONS are an extra-vigorous race, especially adapted for outdoor culture. They are very neat in habit, and remarkable for their rich profusion of flowers, produced in five months from sowing. For masses of bloom, few plants are finer; they are also very suitable for pots. Grown as anruals from seed sown every spring, they are most satisfactory. Our seed of these varieties is grown exclusively in the famous Chabaud Garden of Carnations, Provence, France.

55320 " " Yellow. A clear, soft shade; 112 ft............................................ 25

55350 Giant Margaret. Extra large and perfect flowering, in a rich variety of colors, including yellow;
80 per cent of the flowers generally come double; ift.
25
PERPETUAL CARNATIONS. This race has large, elegantly formed flowers, continually abloom upon
closely branched, symmetrical plants, often called, from their neat habit, "Tree Carnations."
55380 Chabaud Perpetual Double. Mixed-yellow, red, white, etc.; $11 / 2 \mathrm{ft}$. Blooms in 6 mos....... 25
55400 Dwarf Perpetual (Tige de Fer). Real iron-stem. 1 ft.............................................. 50
55410 Marie Chabaud. Pure canary-yellow; the most beautiful and most fragrant yellow............ 50
55420 Comtesse de Paris. Very dwarf; yellow; comes true from seed................................. $5^{0}$
55430 Jeanne Dionis. Enormous flowers of the purest white and most perfect form................. 50
55440 Sparkling (Etincelant). Bright, glittering red of surpassing richness............................ 50
55450 Giant Perpetual White. Very large, perfectly double; flowers in seven months after sowing..... 50
55460 " " Yellow. Eighty per cent comes true to color; creamy to golden yellow......... 50
55480 ." " Fine Mixed. Enormous flowers, perfectly double; splendid colors............. 50

84 J. M. THORBURN \& CO., 33 BARCLAY ST., NEW YORK


CENTAUREA CYANUS

## CARNATIONS, continued

BORDER CARNATIONS, ETC. We invite attention to the splendid collection below:
55510 Red Grenadine, Double. Brilliant scarlet; 2 ft. . pkt., 2
55520 Enfant de Nice (Improved Giantflowered). All colors. Flowers in six months from seed.
55530 Early Dwarf Vienna, Double Mixed. Fine for garden culture and for cutting; I ft...

55540 Early Dwarf Vienna, Double White.
Very fine; always comes true
white.

I3
55544 Fine Double Mixed Variegated. Splendid mixture............... 1
55546 Fine Double Mixed. Self-colored. I5 55550 Fine Double Mixed. Many colors. 2 ft .

10
55560 Double Mixed............ oz. \$I ... 5
Choice Collections of Carnations
5562050 varieties
\$3 00
5563025 varieties............................ . . . 150
55640 I8 varieties........................ . . I 25
55650 I2 varieties .................... . . . 85
55660 6 varieties . . . . . . . . . . . . . . . . . . . 60

## CENTAUREA

C. Cyanus, the popular Cornflower, is also known as "Blue Bottle," "Ragged Sailor," "Kaiser-blume," and, sometimes, as "Bachelor's Button." These are bright-flowered plants of the hardiest nature and simplest culture, yet among the most attractive and graceful of all the old-fashioned flowers.
PERENNIAL FLOWERING. A dry, sandy soil of moderate fertility seems to suit them best.
55800 macrocephala. Flowerheads large, showy, $1 / 1 / 0 \mathrm{z}$.
Pright yellow; $3 \mathrm{ft} . .$. . $\$ 025$ $\mathbf{\$ 0 \text { Io }}$ PERENNIAL SILVER-LEAVED.

These are used for borders or edgings, and thrive anywhere. Flowers white, leaves grayish; height I ft.; half-hardy. $1 / 40 z$.
55810 candidissima............. \$o 30

55820 Clementei................... . . . 25 10 55830 gymnocarpa. . ............. . 25 10

HARDY ANNUALS. Flower finest in full sun and thin soil. Sow in open ground in spring.

55840 Americana. Large, lilac-purple flowers; bushy plants; very fine

55850 imperialis, White. ) Very large ...................................................... . . . . . . 25
$\left.\begin{array}{lll}55860 & \text { " } \\ 55880 & \text { Lilac. } \\ \text { Mixed. }\end{array}\right\} \begin{gathered}\text { flowered; } \\ \text { hardy. }\end{gathered} \ldots \ldots .$. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
55890 odorata, Chameleon. Yellow and rose; fragrant; superb
25 IO

5590 odorata, Chameleon. Yellow and rose; fragrant; superb.......................................
55900 " Margaritæ. Pure white; $21 / 2$ inches across; laciniated and scented; forms stocky,

55910 moschata atropurpurea (Purple Sweet Sultan) .................................................... $\$_{0} 30$. . . . . . . 5
55920 " " alba (White Sweet Sultan)
40
55930 " " Mixed. (Mixed Sweet Sultan)....................................... 30
55940 suaveolens (Yellow Sweet Sultan). Fine . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 40
55950 Cyanus (Cornflower). Blue. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
55960 " Emperor William. Blue; $11 / 2 \mathrm{ft} . .$. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
55970 " Rose. Distinct shade; $11 / 2 \mathrm{ft} . .$. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
55980 " Victoria, Dwarf Compact. 9 in.; for pots and edgings; azure-blue............... 40
40
30
55990 "، Pure White. Very fine............................................................... 30
56000 " Mixed............................... . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
56010 " Double Mixed............................................................................ 30 . 5
56020 " Mixed Dwarf Hybrids. Fine. ..................................................... 50 Io
56060 Collection of 6 varieties of C. Cyanus (Cornflower) ........................................... . . 25

## CHRYSANTHEMUM

Do not confound these annuals with the winter-flowering sorts of the florists. They bloom profusely from early summer until frost, and, when grown in large beds or masses, their bright colors make a splendid show. The plants can be brought into bloom early by sowing the seeds in frames or window-boxes, and afterwards transplanting to the garden; or seed may be sown where the plants are to flower, if the seedlings are thinned to 8 or io inches apart. A little pinching back in early growth makes the plants bushy and shapely. All are fine for cut-flowers. Average height, I to $\mathrm{I} 1 / 2 \mathrm{ft}$. For the magnificent large-flowered sorts, the more expensive packets should be ordered.
56200 coronarium, Double White................................................................. 30 \$o 05
56210 " " Yellow. The flowers are perfect bosses of gold ..................... 30 . 5
56220 "، " sulphureum. Pale yellow............................................. $3^{0} 5$
56230 " " imbricatum, Yellow..................................1/40z. 20c... 10
56240 " " Mixed. Yellow, white, etc.......................................... 25 . 5
56250 tricolor, White. Tricolor sorts have beautiful rings and eyes of color.................... 30 5
56260 " Yellow........................................................................ $3^{5} 5$

56280 " Golden Feather. Foliage rich yellow; flowers bright red and white........... 30 5
56290 " Eclipse. Yellow, with velvety brown band.......................1/40z. 20c... Io
56300 " Burridgeanum. Crimson-maroon, with white edge and inner circle............ 30 5
56310 " Northern Star. Giant white flowers, with black centers....................... . . .
56320 " Mixed, Single. All colors....................................................... 30 $^{5}$
56330 " Double Golden (Dunnetti). Fine...................................1/40z. 25c... 10
56340 ". ". White (Dunnetti)............................................1/40z. 25 c... 10
56350 " " hybridum, Mixed (Dunnetti)............................1/402. 25c... 10
56360 " " Golden-leaved Sorts. A mixture of beautiful yellow-leaved sorts; flowers of various bright, vivid colors..................1/40z. 25c... 10
56370 " Single and Double Mixed.oz. 30c., pkt. 5 56380 " Double Mixed ................ . 56384 " " Dwarf Mixed.... $1 / 4 \mathrm{oz}$. 25c... 10 56390 multicaule. An exceptionally fine little bedder; flowers yellow; 3 in.
56400 segetum, Morning Star. Large, yellow flowers; excellent for cutting . oz. 25c...
56410
Helios, Evening Star. Fine for cutting; pure golden yellow flowers of gigantic size.
oz. 25c...
56420 inodorum, Double. Pretty white flowers, fine for cutting; I ft..
56440 frutescens (Paris Daisy, or Marguerite) (hP). Beautiful for cutting and pot culture; longstemmed, single, white flowers, with golden centers..........................1/40z. 20c... Io
56450 leucanthemum (Shasta Daisy).................. . $о$
56480 Collections, including 12 varieties Chrysanthemum tricolor, Annual. mum tricolor, Annual.

25
PERENNIAL VARIETIES. This section includes the large-flowered sorts, and the pretty, hardy Pompons that make bright masses of color in our gardens long after heavy frosts have cut down other flowers. We wish to make quite clear the distinction between this class and the Annual Chrysanthemums described above, so that, as has sometimes happened heretofore, customers may not order seed of the summer-blooming garden varieties, expecting them to yield the grand show flowers of late fall which are obtained from cuttings carefully cultivated. For ordinary culture and room decoration, plants pinched back to form a number of branches, and holding from five to ten flowers, are satisfactory. Average height of show kinds, 3 feet.
56550 indicum, Double. Will produce superb flowers of different types and colors..pkt., 25
Pompon. The pretty hardy dwarfs, with bright, clustered flowers; $11 / 2 \mathrm{ft}$. 25 56570 japonicum fl. pl. From Finest Flowers. Double. An extra-choice mixture.


ANNUAL CHRYSANTHEMUMS


EXTRA-EARLY FLOWERING COSMOS

## CLARKIA

One of the prettiest and showiest of hardy annuals. The plants bloom so freely and have flowers of such various bright colors that a bed of them in full bloom is a beautiful sight. They are useful, too, for hanging baskets, for vases and as edging plants. Sow outdoors in early spring and grow in partial shade. They bloom through midsummer to late autumn. Average height, $\mathrm{r}^{1 / 2} \mathrm{ft}$.


## COSMOS

One of the notable fall flowers. A strong, tall-growing annual, with bold flowers of exquisite daintiness and airiness, heightened in effect by their foliage-setting of feathery green. It is most effective when planted in broad masses, or long background borders against evergreens or fences. From seed started early in the house or frame, the plants will flower profusely in late June or early July. If topped when half grown, they will bloom quicker, the check seeming to induce earlier flowering. We offer only the choice, large-flowering strains. To make sure of flowering early, Cosmos should be started indoors and transplanted into dry, sandy, or poor soil, in a sunny situation.
57680 EXTRA-EARLY FLOWERING, MIXED. Earliest of all. This new strain will produce Oz. Pkt. flowers in July from seed sown in the open ground in May. Grows 4 ft . tall....... $\$ 060$ \$0 15
COSMOS, continued Oz . Pkt.
57700 Lady Lenox. Lovely, large, shell-pink flowers of great substance................... . .\$0 40 \$0 10
57742 Mammoth Perfection, Conchita. Crimson ..... IO
57744 " " Erlinda. White ..... IO
57746 " " Rosita. Pink. ..... 10
57748 " " Mixed ..... 10
57750 Klondyke. Orange-colored ..... I5
57760 Tints of Dawn. Handsome white flowers, slightly tinged with rose ..... 10
57770 Marguerite. Petals deeply and irregularly fringed; in various bright colors ..... 10
57780 Striped. Charming and distinct; large white centers, and petals deeply striped white. ..... IO

## COCKSCOMB (Celosia cristata. $h h A$ )

We prize and plant the Cockscomb as an odd and picturesque decorative feature of the garden. The bright red and crimson varieties are most effective, both in gardens and in winter bouquets, for which they are cut before fully ripe and dried in the house. The dwarf varieties make novel and attractive borders; the tall ones form striking groups. Transplanting into rich soil about the time the combs begin to form makes the flower-heads much larger. They are bright from midsummer until frost.
57820 All Aglow. Large, fiery scarlet combs; quite dwarf ..... Io
57850 Glasgow Prize. Dark leaves and crimson combs; I ft. ..... IO
57860 Dwarf Bright Red. A miniature plant, with enormous combs of intense bright red. ..... Io
57870 Dark Yellow. Yellow combs nt, with enormous combs of intens
57874 " Light Yellow ..... pkt., 10
57880 White. White combs .....  10
57890 Crimson
Mixed. Extra-large combsFor Celosia plumosa, see page 81, and for other sorts, see page 117

## DAISY (Bellis perennis, elc. $h P$ )

May be sown in February or March in shallow boxes of light, rich soil, covering the seeds to about three times their own thickness, and pressing soil firmly over them. Keep in a warm window, hotbed or greenhouse. When well out of the seed-leaf transplant to new boxes, and set out in the open ground when danger from frost is past. Or, sow in beds outside in August or September; protect with straw or litter over winter, and transplant to their permanent position in the spring.
58400 Double White (Snowball).......
58410 ". Red........................... 65 \$0 10
58420 " Rose (Longfellow).......... 65 Io 58440 " Mixed. Very fine............ 65 58444 " maxima alba. Extra large.
58448 " " rubra. Extra large. rubra. Extra large.
Red. .............

$$
\begin{aligned}
& 58450 \text { " " Mixed. Extra large. } \\
& 58480 \text { Shasta Daisy. Very large; white, } \\
& \text { single flowers on long stems...... }
\end{aligned}
$$

$$
58490 \begin{aligned}
& \text { Single Paris Daisy (Chrysanthemum } \\
& \text { frutescens).......................... } 20
\end{aligned}
$$

## DELPHINIUM (Larkspur)

In variety and beauty of its blue tints, which are as numerous as they are charming; no other plant can equal the Delphinium. The brilliant flowers are strongly effective in beds or masses, in borders, shrubberies, or in combination with white lilies. Ordinarily, the tall sorts are planted among shrubbery, or as a background for dwarfs, which are favorites for bedding. Improvements are continually being made in the size of the flowers, as well as in the length and fullness of the spikes. Some of the species flower both early and late; the season for all can be prolonged by cutting away withered flower-stems. They are sometimes increased by division, but are much more robust when| 10 |
| :--- |
| 10 |
| 10 |

THORBURN EMPEROR BRANCHING DELPHINIUM

DELPHINIUM, continued
grown from seed. All varieties are easily cultivated and adaptable to many conditions, but in a soil deeply dug and well enriched with fine old manure, their blooms are the finest. They must have plenty of room to grow; $11 / 2$ to 2 feet each way is not too much for the taller sorts.
ANINAL VARIETIES. These include the Rocket and Hyacinth-flowered, so called from their long narrow flower-spikes. They bloom best in a rather cool, moist soil. Sow seed in the open border, either in spring or fall, preferably the latter, so that germination may take place very early in the spring. As the seedlings grow, thin them to stand 6 to 18 inches apart, according to variety. The varieties are seldom kept separate, as they are quite as pretty and convenient for cutting when sown in mixture. Some of these are really hardy biennials, but, because they bloom the first season, we treat them as hardy annuals. The shades of color cover a very wide range.


58620 "، Ranunculus-flowered. Double; colors fine; $2 \mathrm{ft} . \ldots \ldots \ldots \ldots \ldots \ldots \ldots \ldots . .$.
58630 " Tall Branching. Choice mixed; 2 ft.......................................... . . . . . . . 30

58650 Emperor, Branching Rose. This and the next are splendidly bright and showy, often
giving 40 to 50 erect spikes of flowers; $2 \mathrm{ft} . . . . . . . . . . . . . .1 / 40 \mathrm{oz}$. $20 \mathrm{c} .$. . Io
58660 " Branching White. Beautiful for cutting. . . . . . . . . . . . . . . . . . . . . $1 / 4 \mathrm{oz} .20 \mathrm{c}$. . . Io
58644 " Branching Mixed. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 1/40z. 20c... .
58670 Newport Rose. A rose-colored and very beautiful, free-flowering sort. If sown outdoors

10
PERENNIAL VARIETIES. These are usually taller than the annuals, requiring more space between the plants. If sown in the fall or very early spring, nearly all will bloom the first season. Foliage clean and pretty; habit strong and neat; flower-spikes long and dazzling.
58680 Barlowi. Large, dark blue flowers; extra fine.
pkt., 25
58684 Belladonna. (New.) Lovely pale blue.


58710 Cashmerianum. Spreading, many branched; flowers often 2 in . wide; deep purplish blue; $3 \mathrm{ft} . .25$
58720 Chinense, Mixed (C. grandiflorum). Large flowers, ranging from pure white to indigo-blue. Young seedlings will bloom from midsummer until frost; 2 ft .

10

58740 elatum, Blue (Bee Larkspur). Soft clear blue flowers in tall spikes; $3 \mathrm{ft} \ldots \ldots$. ..... $1 / 4 \mathrm{oz}$. 25 c .. . Io
58750 " ${ }^{\prime \prime}$ hybridum, Finest Mixed. Very showy . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . $1 / 4 \mathrm{oz} .20 \mathrm{c}$ 20c. . . Io
58752 " " Finest Double Mixed.


ESCHSCHOLTZIA THORBURNI (see page 89)

58760 formosum. Brilliant blue, white center; especially fine and attractive; 3 ft .. 20 58770 " cœlestinum. Sky-blue; handsome; true..... 20
58780 hybridum fl. pl. Finest double and semi-double sorts in choice colors; a superb mixture; 3 ft .

20
58790 " Burbank's. 3 Wonderful blue shades; splendid sorts; giant-flowered.. New Large Hybrids, Mixed. All shades of biue from best named varieties only. $1 / 4 \mathrm{oz} .35 \mathrm{c}$. 15 58800 nudicaule. The only pure bright scarlet. Dwarf and compact in growth, with flower-stems of fine length; I ft. A native of California.

```
30
```

58810 Zalil (sulphureum). Very beautiful hardy perennial, with long spikes of yellow flowers.

30

## Collections of Delphinium

|  | 12 vars. |  | Dwarf Rocket, Annual..\$0 45 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 58850 | 6 | , |  |  | .... 25 |
| 58860 | Io |  | Tall Rocket |  | 40 |
| 58870 | 6 |  |  |  | 25 |
| 58880 | 6 |  | Emperor |  |  |
| 58890 | 6 |  | Ranunculus-fl'd |  | 25 |
| 58900 | 8 |  | Tall Branching |  |  |
| 58910 | 6 |  |  |  |  |
| 58920 |  |  | Hybridum. |  |  |

$\qquad$

## ESCHSCHOLTZIA

## (Commonly called California Poppy)

The state flower of California. An annual, very bright and rich in its pure tints of yellow, orange, etc. The plants average about a foot in height, with silvery foliage, and produce their large, poppy-like flowers from early spring until frost. They are most effective when grown in beds of considerable size, over which the seed may be sown broadcast thinly and lightly raken in. These sowings may be made early in spring or late in autumn for earlier germination, blooming the next spring. Useful as a pot-plant and for cut-flowers.
59350 THORBURNI. Coppery orange; very large
flowers; finest of all ..... $1 / 4 \mathrm{oz}$. $40 \mathrm{c} . \mathrm{F}$. pkt., 10 59360 californica. Rich yellow ..........oz. 25c... 5 59370 " alba. Creamy white. oz. 30c... 5 59372 " " fl. pl. Fine sort, with double, creamy white flowers.......oz. 40c.. . 10 59374 " Burbank's Crimson-flowering. Crimson........1/40z. 25c... 10 59380 " Carmine King. Carmine-rose; beautiful. ....... 1/400. 25c... Rose-Cardinal. Carmine-rose. 1/40z. 20c... 10
59400 crocea. Pure, deep orange.........oz. 25c... 5
59410 " Double Orange............oz. 35c..- 5
59424 aurantiaca fl. pl. Double; orange..oz. 35c... 5
59430 " Single Orange . . . . . . . .oz. 25c. . .
59444 maritima. Canary-yellow, with orange center; leaves grayish...oz. 30c...
59450 Golden West. A superb variety with very large flowers of deep yellow; $2 \mathrm{ft} . . . . .$. ....oz. 4 oc .
59460 Douglasii. Very pretty yellow variety from California.
59470 tenuifolia. Bright yellow; leaves dense and finely cut; Ift .

5
59490 Mandarin. Red-gold flowers, orange within and scarlet without. oz. 30c... 10 59500 Mixed. Many sorts. oz. 20c... 5


FOXGLOVE, GLOXINIA-FLOWERED (See p. 90)

## FORGET-ME-NOT (Myosolis. HP)

These dainty little flowers love cool, moist soils and, like pansies, bloom most freely in fall and early spring. They make beautiful close borders, or edgings, and will bloom nicely in winter in a cool room or coldframe. They establish themselves by self-seeding. Sow in spring in a warm, sunny border. Most varieties bloom freely the first season and profusely the second. Average height, 6 ins.
59700 Myosotis alpestris. A pretty trailer, with blue flowers. .

. \begin{tabular}{ll}
$1 / 40 z$.

$\quad$

Pkt. <br>
$\$ 0$ <br>
0
\end{tabular}

59780 Mixed ..... ı
59790 hybridus, Star of Love. A distinct dwarf variety, with large, beautiful blue flowers. ..... 25
59794 " Ruth Fischer. Pure Forget-me-not-blue. Fine for cutting and for hanging baskets. Can be forced successfully and, owing to its extreme hardiness, it is valuable for spring bedding in open ground
59800 azorica. Dark blue, with white eye; Ift. ..... 25
59810 " cœelestina. Beautiful light blue; ; ft. ..... 25
59820 dissitiflora. Blooms very early; flowers blue. ..... 25
59830 palustris (True Forget-me-not). Blooms the second year abundantly all season ..... 10
59834 " semperflorens. Dwarf; blooming from spring until autumn. ..... 25
59840 sylvatica. Blue, with yellow eye; likes dry soil; I to 2 ft ..... 10


GAILLARDIA GRANDIFLORA MAXIMA

## FOXGLOVE (Digitalis)

The tall flower-spikes of the Foxgloves, often 2 to 3 feet long, are particularly handsome when grown among shrubbery, or in bold masses. Used as a background for lower plants, they are very fine. Seed may be sown outdoors in spring and the seedlings transplanted where they are to grow, or, preferably, to a coldframe, where they make extra-strong plants that will flower in magnificent spikes the next season. They are most satisfactory when treated as biennials, sowing the seed every year in rich, deep soil and partial shade. Average height, 2 to 3 feet. When the center spike begins to fade, it should be cut out and the side shoots will grow more vigorously.
60000 purpurea, Purple. Best known..oz. 25c., pkt. 5 60010 " White. Fine and attractive......
oz. 30c... 5
60030 " Rose......................... 50.... . ${ }^{5}$
60040 " Mixed.................. oz. 25c... 5 60050 gloxinioides, White. Very handsome, glox-

> inia-like flowers; robust; beautiful for cutting.

10
60060 "، Purple.......................... 10
60070 " Rose. Bright and showy...... 10 60080 " Mixed. All the choice colors. oz. 40c... 10 60090 maculata superba. Splendid spotted strain. $1 / 40 \mathrm{oz}$. 20c... . 10 60094 grandiflora, Yellow. Large flowered; long racemes of bell-shaped blossoms; dwarf.. . I 60100 monstrosa, Splendid Mixed. Very large, bellshaped flowers of exquisite beauty, borne on long spikes; 4 ft .
60140 Collection including I2 varieties of Foxglove.. 45

## GAILLARDIA

## (Blanket Flower)

Showy and free bloomers, flowering profusely all summer. They are good bedders; fine for bouquets and for house decoration. They do best in a good, light soil and in an open, sunny situation.
60250 amblyodon (hA). Fine red.............pkt., 5 60260 grandiflora maxima ( hP ). Golden yellow. Flowers first season if sown early; $21 / 2 \mathrm{ft} \ldots 1 / 4 \mathrm{az}$. 25 c . . . io 60264 " oculata. New light shades with red centers; very fine, large-flowering hybrids....... io
60280 " Extra-Fine Mixed (hP).......................................................... 40c... 10
60284 " semi-plena Mixed (hP). Superb; very large-flowering, semi-double varieties ....... I5
60290 picta (hA). Red and yellow....................................................................... 25 c ... 5
60300 "/ Lorenziana. Double mixed...................................................................... 30c... 5
60310 " Salmonea. Salmon-red; fine............................................................. oz. 25c... 5
60320 " Mixed.................................................................................... 25c... 5
60350 Collection, including best 6 annual varieties.................................................. 25

## GODETIA

Choice, free-blooming annuals, with widely opened flowers of satiny texture, and of the most delicate and lovely colors. They are beautiful for solid beds, border lines, for pots, and for growing in shaded places, where so few really fine flowers will flourish. Sow seed in the open border in spring, or in a coldframe, and transplant seedlings to stand a foot apart in rather thin soil. Fine for cut-flowers. Average height, $11 / 2 \mathrm{ft}$. 60780 CRIMSON GLOW. New. Intense, dazzling crimson; fine, compact grower; very floriferous.pkt., 15
60800 Rosamund. Large; glossy pink. ..... Io
60810 Princess of Wales. Brilliant carmine. ..... 5
60820 Lady Satin Rose. (G. Whitneyi compacta, Brilliant). Bright carmine. ..... 5
60830 Fairy Queen. Large, white flowers, with carmine spots ..... 10
60840 gloriosa (Lord Roberts). Darkest red; dwarf ..... IO
60850 grandiflora maculata. Great, white flowers, blotched with carmine ..... 5
60854 rubicunda splendens. Brilliant red; fine ..... 5
60860 White Pearl. Beautiful glossy white ..... 5
60870 The Bride. White and crimson ..... 5
60880 Duchess of Albany. Satiny white. ..... Io

GODETIA, continued
60890 Lady Albemarle. Dark crimson. ..... pkt., 10
60900 " " compacta (General Gordon). Dark crimson; dwarf ..... 10
60910 Lindleyana. White and red ..... 5
60920 Bijou. Of dwarf, bushy habit; lovely blush-white ..... 5
60930 Whitneyi. Superb, rosy flowers, blotched crimson; elegant pot-plant ..... 5
60940 " Brilliant. Carmine; very showy ..... 5
60950 Mixed, Tall Varieties ..... 5
60960 " Dwarf Varieties ..... 5
60990 Collection of Godetias, including 6 choice varieties. ..... 25

## DOUBLE HOLLYHOCKS

(Althea rosea)
These stately, old-fashioned perennials are most striking when seen in groups or long rows against evergreen hedges, shrubbery, etc., and, in their turn, form a very fine background for plants of lower growth. Their color variety is wonderful, ranging from pure white through almost every conceivable shade of yellow, red and rose to ashen gray and almost black. Although Hollyhocks are very permanent and hardy for the first winter, it is advisable to sow seed every year, as the flowers on young, vigorous plants are much finer than on old ones. Sowings should be made in April or May, and not later than June, to flower the next year. In final transplanting, give each seedling a foot or more space each way for development. Average height, 4 feet. Our seed is of magnificent, double varieties, grown from Chater's celebrated collection, which has revolutionized the popular estimation of the Hollyhock.
$1 / 40 \mathrm{z}$. Pkt.
Apricot..................... \$o 60 \$0 10
61860 Bright Pink................... . . 60 Io
61880 Bright Rose . . . . . . . . . . . . . . . . . 60
61900 Cherry....................... . . 60
61910 Canary-Yellow................ . 60
61918 Chamois-Rose. . . . . . . . . . . . . . 60
61924 Cinnamon. . . . . . . . . . . . . . . . . . 60
61930 Sulphur-Yellow. . . . . . . . . . . . . . 60
61940 Lilac.......................... . . . . 60
61960 Light Rose. . . . . . . . . . . . . . . . . . 60
61980 Maroon. . . . . . . . . . . . . . . . . . . . 60
61990 Salmon . . . . . . . . . . . . . . . . . . . . 60
62000 Bright Scarlet. . . . . . . . . . . . . . . 60
62010 Snow-White . . . . . . . . . . . . . . . 60
62014 White and Sulphur.......... . 60
62018 White, Brown center. ........ 60
62020 Mixed Allegheny Fringed. . . . 50
62030 Hybrid Annual Everblooming Double and Semi-double Mixed. Flowers the first season from seed........... $5^{0}$

## 62034 rosea nigra, Single-flowered.

 Color almost black. oz. 3oc.62040 Mixed Double................ 50
62050 " Single.......oz. 50c.
Choice Collections, including12 varieties Double Hollyhocks, Chater's Superb
621008 varieties Double Hollyhocks, Chater's Superb
621106 varieties Double Hollyhocks, Chater's Superb

double holly hocks

## IPOMOEA

(Moonflower. Morning-Glory. Cypress Vine)
Of all our climbers for garden and greenhouse these are the quickest and most luxuriant in growth. Ipomœeas grow so easily from annual sowings that it is no longer thought necessary to winter over roots or young-cutting plants under glass. The large, horny seeds of some varieties should be soaked in hot water before planting. For early flowers sow in hotbeds or pots and boxes under glass, and transplant to rich, deep soil in summer quarters as soon as danger of frost is over, when sowings may also be made in the open ground. Nothing finer for porches, trellises, etc.
*These are very hard-seeded, and, in order to hasten germination, a notch should be filed in the seed before planting.
ANNUAL VARIETIES. From early sowings these begin to bloom in June and July, and are full of beautiful flowers all the seaşon, often blooming freely until cut down by frost.

62360 " lutea. A yellow-flowered variety................................................. . oz. 25c... 5 Imperial Japanese. See Japanese Morning-Glory, page 94.
62370 hederacea grandiflora superba. Rich sky-blue flowers with white margins; $15 \mathrm{ft} .$. . . . . oz. 25c... 5

## 62380 " $\quad$ fol. marmoratis, Mixed, Variegated <br> oz. 25c. <br> 5


62400 limbata. Violet and white; $5 \mathrm{ft} . .$. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 25c. . . . . . . 5


62420 " " hybrida alba. Flowers very large and numerous; $15 \mathrm{ft} \ldots \ldots .1 / 4 \mathrm{oz}$. 25c... io
62430 *bona nox (Good Night, or' Evening-Glory). Large, blue flowers open in the evening; I5 ft..oz. 25c.. . 5
62440 Heavenly Blue (rubro-cœrulea). The very large, clustered flowers of beautiful sky-blue, open early in the morning. Unusually distinct and handsome; 10 ft . Sow early....... $1 / 40 \mathrm{~m}$. 20c... 10

62446 " " grandiflora. Early flowering. Produces gorgeous sky-blue flowers with rosecolored markings, from 4 to 5 inches across, in great abundance. Rapid grower. If sown in boxes or hotbeds, the young plants may be set out in April or May in a sunny situation, where they will flower from end of June until frost. Flowers remain open all day. 15 to 18 ft .

15
62450 Quamoclit (Cypress Vine; Star Flower). A tender annual, with finely cut leaves and smail, star-shaped flowers. This, the type, is scarlet-flowered; io ft.............. oz. 30c...
62460 " White............................................................................................................... 5
62470 " Kerberi. Fine scarlet flower; blooms late .................................. . . oz. 40c... Io
62480 " Mixed Cypress Vine................................................................ . . oz. 30c.. . 5
62490 Ivy-leaved Cypress Vine. Pretty leaves, deeply lobed; fiery orange-scarlet flowers... . . oz. 40c. . . Io
62530 Collection, including 12 varieties. Annual sorts.................................................... . . 50
GREENHOUSE CLIMBERS. These handsome vines grow nicely in open ground, but bloom almost
too late to be very useful there, in all except warm climates. Grown in pots, tubs or greenhouse beds, they flower grandly between October and spring.
62550 Horsfalliæ. A superb West Indian species of vigorous growth. The rich, thick leafage is beautiful; the flowers a deep, glossy rose-purple; 15 ft .
62560 Learii. Quick, strong grower, sometimes succeeding well outdoors. Flowers violet-blue; is ft.... Io
62590 setosa (Brazilian Morning-Glory). This vine makes an immense, thick growth of great, lobed leaves lighted by a profusion of large, rosy flowers, with a satiny pink star in the centers. The red pubescent stems and seed-pods add to its attractiveness. 10 to 20 ft .

## KOCHIA (Summer Cypress)

A splendid ornamental annual, growing 2 to $21 / 2$ feet high. The slender-leaved plants are of a cypresslike appearance during summer, changing their light green foliage to carmine and fiery red colorings toward autumn. Forms beautifully decorative bushes on the lawn.
62650 tricophylla. An improved strain of $K$. scoparia
oz. 25c...pkt., 5

## LOBELIA

The Erinus varieties are charming little plants that bloom very quickly from seed and continue gay with flowers all through the season. For beds, edgings, baskets and pots there is nothing prettier. Sow outdoors in early spring where the plants are to grow, and thin moderately; or transplant several inches apart in rich, open soil. Some stimulant given when they are in bloom greatly improves the flowers. Almost all are also good winter conservatory plants of trailing habit. The perennial or tall varieties are handsome, showy plants and will be found quite effective for backgrounds and grouping.
ERINUS VARIETIES (tA)-

62960 speciosa, Crystal Palace. A favorite blue-flowered edging plant; 6 in............................ 10
62970 alba. White flowers. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
62980 kermesina. Crimson. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10

## CATALOGUE OF HIGH-CLASS SEEDS

## I.OBELIA, continued

62990 Lindleyana. Rose; white eye ..... pkt., 10
63000 Paxtoniana. Blue and white. ..... 10
63010 Barnard's Perpetual. Deep blue, with white eye; very fine ..... 10
63020 Royal Purple. Deep blue, with a distinct white eye ..... 10
63030 Mixed (gracilis) $1 / 4 \mathrm{oz} .20 \mathrm{c}$. ..... 5
63040 erecta, Crystal Palace compacta. Dark blue; for bedding; 6 in ..... 20
63050 " Emperor William. Light blue; very fine ..... 20
63060 " Golden Queen. Dwarf; blue flowers; yellow leaves; very fine sort ..... 25
63070 " White Lady. Splendid large-flowered white. ..... 10
63100 Collections, including 12 varieties Lobelia ..... 60
63110 6 6 ..... 35
PERENNIAL or TALL VARIETIES -
63140 cardinalis (Cardinal Flower). Long spikes of richest cardinal-red ..... 10
63150 " (fulgens), Queen Victoria. Brilliant scarlet; dark leaves; striking and beautiful ..... 30
63160 ramosa. Blue; flowers profusely in fall; height I ft. ..... 1063300 tupa (Devil's Tobacco). A splendid perennial plant producing in great abundance curious,beaked, scarlet flowers about $21 / 2$ inches long. It resembles in some respects a gigantic $L$. car-dinalis. It grows to a height of 8 to 10 ft .10

## MARIGOLD

(Tagetes)
These, like the Calendulas, are valuable because they light the garden with such a grand glitter of yellow far into the frosts of autumn. The dwarf varieties make a fine border for taller sorts, and both are effective when planted in groups or in garden borders. Hardy annuals. Average height, $11 / 2$ to 2 ft . All our own special strains, vastly different from the ordinary sorts commonly sold.

> African-
> 63500 Orange. Rich orangecolor. .oz. 4 oc. . . pkt., 63510 Eldorado. Large, quilled, perfectly double; brilliant shades of yellow. oz. 30c...

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63520 Pride of the Garden. Extra-large, double flowers of richest yellow; dwarf and neat. $1 / 4 \mathrm{oz}$. 20c. .
63530 Delight of the Garden. Dwarf; large flowered; lemon-yellow; double.

$$
\text { oz. } 40 \mathrm{c} . . \text {. } 10
$$

63540 Lemon Queen. Very rich lemon-yellow.
oz. 30c.

63550 Prince of Orange. Beautiful orange-color.

$$
\text { oz. } 30 \mathrm{c} \text {. }
$$

63560 Mixed Double..oz. 3oc.
63570 French, Tall Dark Brown. Reddish brown; extremely floriferous; Ift . oz. 40 c .
63580 French, Dwarf Striped. Flowers handsomely marked; $11 / 2 \mathrm{ft}$. oz. 40 c.. io
63600 French, Dwarf Dark Brown. Beautiful reddish brown. .oz. 4oc.
63610 French, Dwarf Legion of Honor (Little Brownie). Single, golden yellow blooms, marked with velvety red..oz. 40 c . 5

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10
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PRIDE OF THE GARDEN MARIGOLD


ALLEN'S DEFIANCE MIGNONETTE

MARIGOLD, continued
63620 French Tall Mixed, Double............ oz. 30c. . . pkt., 5
63630 " Dwarf Mixed, Double................. oz. 3oc... 5 Collections, including -
63670 I2 varieties Double French Marigold. . . . . . . . . . . . . . . 50
63680 " " " " ................... 30
63690 " " African " ................ 35
See also Calendula, page 79

## MIGNONETTE

(Reseda odorata. hA.)
Seed of this popular annual can be sown at any time, and if successive sowings are made, its fragrant, modest-colored flowers may be gathered outdoors until November. Sow in pots or boxes under glass in February or March, and thin or pot off the seedlings to make good plants for bedding out in April. Sow outdoors in rows about April I, and again regularly at intervals of about three weeks till August, a row or two at a time for succession. The July sowing will make good winter-flowering plants.

Oz. Pkt.
63850 Reseda odorata grandiflora. Sweet........ . \$0 20 \$0 o5
63860 Crimson Giant (ameliorata). Red-flowered... 255
63870 Golden Queen. Golden yellow............... . . 45 Io
63880 Paris Market (Crimson Queen). Crimson.... 60 Io
63890 Machet Dwarf. Deep red. . . . . . . . . . . . . . . . . . 60 io
63900 Machet, Golden. . . . . . . . . . . . . . . . . . . . . . . . . . . . 65 io
63910 Bismarck. Improved Machet................... . . 70 Io
63920 Gabrielle. Large; red; 9 in.................... 50 . 10
63930 Goliath. Red; enormous spikes; striking...... $1 / 4 \mathrm{Oz} .35 \mathrm{c} .$. . 15
63940 Victoria. Compact; brilliant red; 6 in.......... 50 Io
63950 Miles' Spiral. I ft. . . . . . . . . . . . . . . . . . . . . . . . . 25 5
63960 Giant Pyramidal. $11 / 2 \mathrm{ft} . \ldots . .$. . . . . . . . . . . . . . 40 Io
63970 Diamond. Pure white flowers; extra fine.... 50 Io

63990 Ruby (Rubin). Very fine strain of the Machet,
with coppery scarlet flowers.... $1 / 4 \mathrm{oz} .25 \mathrm{c}$..
64000 Parsons' White. White and buff; 9 in....... . 40 Io
64010 White Pearl (Machet). The best white variety . . . . . . . . . . . . . . . . . . . . . . . . . $1 / 4 \mathrm{mz} .35 \mathrm{c} .$. . I 5
64040 Collection, including 12 varieties Mignonette . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 60

## IMPERIAL JAPANESE MORNING-GLORY

The leaves are mostly plain green, but some are oddly blotched with white or yellow. Flowers vary from pure white to carmine, through blues and purples of every shade to almost black. Vines vigorous, growing rapidly to a height of 10 or 20 feet, and their foliage is spangled with hundreds of large and lovely flowers.
64100 Finest Single Mixed. Large flowered; all colors . . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 20c. . . pkt., 5
64110 Fringed Single Mixed. All beautifully fringed. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 3oc.. . 5
64120 Double-flowered Mixed. Superb mixture of double sorts. . . . . . . . . . . . . . . . . . . . . . . $1 / 4 \mathrm{oz} .30$. 30 .. 15
64130 Giant "Mikado." The largest flowered. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 1/40z. 20c. . . Io

Mrs. Jas. L. Staten, of North Carolina, writes under date of September 18, igi2: "Have never seen such wonderful Pansies and China Asters as I raised from your seed last year. Have given your name to several friends."

Mrs. G. A. Scribner, of Long Island, writes under date of September 9, I9I2: "The Flower Seeds I bought from you in the early spring gave me a beautiful garden under the most trying conditions of poor soil, long absences and many other drawbacks, and I am most anxious to get the full benefit of an early start next year."

## NASTURTIUM

A marvelous range of new colors has been developed in this favorite flower which, for three or four months of the season, makes a better display than almost any other plant. No other annual will produce such a lavish profusion of flowers for so long time with the same small outlay of time and labor. The maximum of bloom is produced in thin soils, and never flags through the hottest weather. In soils too rich leaves predominate and the plants are apt to rot off in wet weather, especially if standing too close.
For Climbing varieties and the celebrated Lobb's, see next page

## DWARF, or TOM THUMB

(Tropeolum nanum)
These have a neat, compact habit and attractive foliage, are not disturbed by insects, bloom in two months from sowing, and most profusely the whole season.
64600 atrococcineum. Brilliant scarlet; fine....oz. 20c.. . pkt., 64610 Aurora (Terra-cotta). Fine.

$$
\text { oz. 2oc... } 5
$$

64620 Beauty. Yellow and scarlet. . . . oz. 20c. . . 5
64624 Bronze-Color. Distinct. 64630 Chameleon. oz. Moctled 64630 Chameleon. oz. Mot... crimson, bronze and yellow; very fine..... oz. 20c... 5 64640 cœruleo-roseum. Bluish 5 Yellow and carmine.

$$
\text { oz. } 20 \mathrm{c} . . .5
$$

64670 Empress of India. Deep crimson; fine, dark foliage.....

$$
\text { oz. } 20 \mathrm{c} .
$$

$64680 \begin{gathered}\text { Golden Cloth. Golden } \\ \text { yellow leaves; scar- }\end{gathered}$
$64680 \begin{aligned} & \text { Golden Cloth. Golden } \\ & \text { yellow leaves; scar- }\end{aligned}$ let flowers...

$$
\text { oz. 20c... } 5
$$

64690 Golden Dream (Reve d'Or). 64690 Bright yellow; intense green foliage: . oz. 20c. . . 64700 Golden King. Golden yellow. ......... oz. 2oc. 64710 King of Tom Thumbs. Scarlet; fine color.......
oz. 20c... 64720 King Theodore. Black, 64720 King Theodore. Black, oz. 20c. . . 64730 Lady Bird (Spotted King).

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64740 Prince Henry. Light yellow, marbled scarlet
64760 Ruby King. Ruby-red; dark-leaved; fine... ..... 5
64780 Spotted ..... 5
64790 Vesuvius. Salmon-rose; fine ..... 5
DWARF, or TOM THUMB NASTURTIUM, continued

Oz Pkt. 64800 White, or Pearl. (Moonlight)..\$0 20 \$0 05 64806 Tom Thumb Spencer, Riemke Groot. Odd, wavy, dark green foliage; bright scarlet flowers. 10
64820 Dark-leaved Sorts in mixture. $1 / 4 \mathrm{lb}$.
$25 \mathrm{c} ., 1 / 2 \mathrm{lb} .40 \mathrm{c}$., lb. 75 c . .... 10
64824 Golden-leaved Sorts, Mixed..... 20 64830 Ivy-leaved Golden Butterfly. Golden orange, fringed flowers; deep green ivy-like foliage . . . . 25 5
64834 Ivy-leaved, Lady Bird. Yellow flowers, blotched crimson.... . . 25
64850 Ivy-leaved, Mixed. Fine........ . 25
64854 Spotted Varieties, Mixed. Spotted, blotched and marbled sorts. 20

64860 Variegated-leaved Queen of Oz . Tom Thumbs. Brilliant orange-scarlet flowers, beautiful silver-variegated leaves. Splendid
64864 Variegated-leaved Queen of Tom Thumbs, Chameleon. Produces a magnificent display of colors; very showy......................... 30 10
64866 Variegated-leaved Queen of Tom Thumbs, Golden Yellow did range of colors of varie-gated-leaved sorts............. . 2

2540
64940 ..... 30

## TALL or CLIMBING NASTURTIUM

(Tropcolum majus)
Besides their ordinary garden use for trailing over fences, trellises, stone walls, etc., these can also be grown as pot-plants for winter-flowering as screens, or as trailers for hanging baskets and vases.
64980 Jupiter. Giant-flowered; beau- Oz. ${ }^{\text {Oz }}$ Pkt. tiful golden yellow.......... . \$0 I5 \$0 05
64990 Chameleon. Various
65160 Scheuerianum coccineum. Scar- Oz.Scheuerianum coccineum. Scar- Oz.
let-striped...................... ${ }^{\text {Pkt. }}$ I5 $\$ 0$ o5blotched. . . . . . . . . . . . . . . . . . . 155
65000 Dark Crimson ..... 15
65002 Dark Crimson, Golden-leaved ..... 15
65010 Edward Otto. Brownish lilac.... I ..... I5
65014 Fordhook Fashion. Light crim-son-rose, veined old-rose . . . . . . 20
65020 Golden-leaved Scarlet ..... 15
65030 hemisphæricum. Orange ..... 15
65040 Heinemanni. Chocolate ..... 15
65050 King Theodore. Black. ..... 15
65080 Pearl (Moonlight). Whitish. ..... 15
65090 Prince Henry. Light yellow, red- marbled. ..... 15
65100 Regelianum. Purplish violet ..... 15
65110 Moltke. Bluish rose ..... 15
65140 Scarlet ..... I5
65150 Scheuerianum, Spotted ..... I5
65170 Schillingi. Yellow, maroon-
Darkest leaved ............. 15
65180 Schulzi. Darkest leaved ..... I5 ..... 5
65200 Sunlight (Dunnett's Orange). Richgolden yellow; flowers nearly3 inches across................. . . I55
65220 Yellow (luteum) ..... 5
65230 Vesuvius. Salmon; dark leaved. . I5 ..... 5
65270 Fine Mixed $1 / 4$ lb. 20c., $1 / 2$ lb. 35c., lb. 60c... 10 ..... 5
65280 Ivy-leaved Golden Gem. Yellow. 30 ..... 10
65290 Mixed. Distinct, ivy- shaped leaves.................. 25 ..... 5
65300 Variegated-leaved, Mixed. Beau-tifully variegated foliage; dis-tinct and charming5
65340 Collections, including 12 varieties Tall or Climbing Nasturtium ..... 40
65350 ..... 30
LOBB'S CLIMBING NASTURTIUM
(Tropaolum Lobbianum)
TROP压OLUM LOBBIANUM. This class is re-markable for the intensely brilliant colors ofits flowers, which are a trifle smaller than thoseof other sorts. In moderately rich soil theyclimb high and bloom brilliantly. Averageheight, 6 feet.Lobb varieties. The foliageis veined and marbled white,setting off the rich rosy scarletflowers to great advantage.
\$0 05
65410 Asa Gray. Yellowish white...... I5 ..... 5
ropurpureunI5
dark leaved.....................I5
65450 Lucifer. Very dark scarlet, dark
I5
I5
65460 Crown Prince of Prussia. Blood- red ..... 15
65470 Geant des Batailles. Sulphur Oz. Pkt.and red.................... ${ }^{0}$ I 5\$0 05
65480 Primrose. Cream, with brown5
spots ..... 15
65490 Crystal Palace. Scarlet ..... 5
65500 Spitfire. Brilliant scarlet. Very fine. . . . . . . . . . . . . . . . . . . . . . . . 15 ..... 5
65520 Lilly Schmidt (Victoria). Scarlet. I5
65530 Chaixianum. Yellow, spotted red. I5 ..... 5
5
65540 Golden Queen. Fine yellow ..... 15 ..... 5
65560 Ivy-leaved, Scarlet. Dark green, ivy-like leaves, deep scarlet ..... IOflowers.........................
65580 fimbriatum, Mixed. Fringed sorts 65580 fimbriatum, Mixed. Fringed sorts 20 ..... 5
65590 Finest Mixture. $1 / 4 \mathrm{lb}$. $25 \mathrm{c} ., 1 / 2 \mathrm{lb}$. 10 ..... 5
65600 Madame Gunther Hybrids. A
French strain noted for wide range of colors. ..... 5
65640 Collections, including 12 varieties Tropæolum Lobbianum ..... 45
65650


## PANSY <br> (Viola tricolor. Heartsease. hA)

## Our strains have never been excelled

The Pansy is a plant that we all delight to grow in plentiful supply for flowers all the year. For very early outdoor bedding, the seed is sown from August to October, in a coldframe, or in rich, moist garden beds, from which the plants can be transferred to a coldframe, setting them 2 to 3 inches apart each way before severe winter weather begins. In spring, three-fourths of them can be lifted out for bedding and the rest left to bloom in the frame. For winter blooming in a frame, set the plants about twice as far apart, and thin out half of them in the spring. Cover the blooming plants with sashes, adding a covering of matting or straw in very cold weather. In mild weather, remove the mats and tilt the sashes to admit light, heat and fresh air. In outdoor beds, raised a few inches above the ground, with a mulch of dry leaves and some brush to hold them in place, Pansies will often winter nicely and bloom until midsummer, when a relay of young, vigorous plants should be ready to replace them. Spring sowings should be made early so as to secure good flowers during the early rains. Seed sown in a cool, moist place in June and July, and well tended, will give good flowering plants for fall. If they come into bloom in the heat of the summer, the flowers may be small at first, but, as the weather becomes cooler, they will increase in size and beauty. Through summer heat the flowers are finer in a somewhat shaded place, but in almost any situation good Pansy seed will give fine flowers in spring and fall. Early fall sowings give the finest flowers. The higherpriced sorts produce the largest flowers. This should be borne in mind when ordering.
66000 Thorburn Superb. The richest and most choicely varied mixture possible. It $1 / 40 z$. Oz. Pkt.
 66010 Bugnot Superb Blotched. An exceedingly large,three-blotched strain, with upper petals finely lined; great diversity of finest colors.......................... . . I 25400125
66020 Cassier, Finest Mixed. Flowers of grand size, beautifully spotted........... $125 \quad 25 \quad 4$ I 20 66030 Masterpiece. Curled, wavy petals; splendid colors; distinct. .................. 66040 Madame Perret. A splendid giant-flowered strain, comprising all shades of red from light rose to dark purple, some of them finely striped.
$\begin{array}{llll}50 & 1 & 75 & 15\end{array}$

66044 Odier, Cassier and Bugnot, Mixed. An extremely rich, large-flowered mixture. I

| 35 | 1 | 25 |
| :--- | :--- | :--- |
| 10 |  |  | 66050 Giant Orchid-flowered Mixed. A splendid, distinct race showing remarkable combinations of colors, including shades of chamois, terra-cotta, orange, etc. 66054 Non Plus Ultra. A very rich mixture largely made up of Cassier and Trimardeau varieties.



## PETUNIA HYBRIDA (hat

Once fairly started, the Petunias grow almost as easily as weeds and furnish a glorious succession of bloom from early summer until frost. The large-flowered strains are very beautiful and of almost endless variety. Seed of the Double and Giant-flowered Petunias is made expensive by the great amount of labor involved in hand-fertilization, and it is well to handle seed and tiny seedlings with some care. Sow in hotbed, coldframe or in boxes of fine soil in the sunny windows of a warm room in April or May and transplant about I foot apart in garden beds. Seed of the double varieties has not so much vitality as that of single sorts and needs a little more care in watering to be sure of germination. We have no better plants

PETUNIA HYBRIDA, continued
than the Petunias for beds and masses, borders, window-boxes, baskets and vases. They will grow in almost any soil and bloom profusely through long droughts. The newer varieties are of brilliant colors. The highest-priced sorts produce the finest and handsomest flowers, and those we offer are from the most carefully selected strains, saved at great expense. Apparently similar sorts offered at lower prices are not to be compared with those we offer.
SINGLE LARGE - FLOWERED. These have flowers 4 or more inches across. Our strains are superb, and the collections offered contain only the finest varieties. Average height, 1 $1 / 2 \mathrm{ft}$.
66900 White. Clear paper-white flowers of unusual size. pkt., 25
66910 intus aurea. Large, yellowthroated crimson flowers.... 25
66920 Crimson Giant "Midnight." Great flowers of deepest crimson.
66930 Purple King. Royal in color and size.

25
66940 Rose. A charming shade..... 25
66950 Rainbow. Of richest colors, with yellow-penciled throats. $5^{\circ}$
66960 superbissima. Grand flowers of various colors with richly tigered throats.
66970 Thorburn Superb Giant. A strain of surpassing beauty, with extremely large, deepthroated flowers; some exquisitely penciled and elegantly fringed.
66980 Emperor, grandiflora, Mixed. Very large, wide-open flowers, with distinct colorings and markings. Some of the blossoms have pink stars, some white stars, others are striped.
66990 Superb Single Mixed. Offers a grand variety of colors.

## FRINGED LARGE-FLOWERING.

These have deeply cut and fluted margins.-
67010 White, "Snow Storm." Finest white.
67020 Crimson. A very rich color... 25 67040 Ruffled Giants. Extra-large flowerš, beautifully ruffled, fluted and fringed

thorburn's ruffled giant petunias

67050 Thorburn's Century Prize. An unrivaled strain of fringed, ruffled, giant-flowered sorts in pkt., 50 beautiful colors. Very valuablebeautiful either for house, garden, or conservatory. The Double Petunias are great favorites for potculture in ordinary windows. Only a small proportion of the double strains bear double flowers. The reasonof this is the fact that the seed must be selected from single flowers, the double ones not producing seed. Thesingle flowers must be pollinated with pollen from the double ones. Cuttings may be made from double-
flowered plants and inserted in light, sandy loam for rooting, thus increasing the percentage of doubleflowering plants.
67070 Double Mixed Large-flowering. (250 seeds in pkt.)............................................pkt., 50
67080 " Fringed Mixed Perfection. Flowers large and much beruffled............................ 75
67090 " "" Lady of the Lake. Exquisite flowers of finest size and purest white........... 75
67100 " " Heliotrope. Mauve and heliotrope colorings................................... 75
67110 " " Snowball. A grand pure white; extremely double; extra-large flowers......... 75
67120 " " Crimson. Gorgeous colors; extra-large flowers.................................. 75
SINGLE BEDDING VARIETIES. Smaller-flowered sorts, found most valuable for beds and masses.
67140 Countess of Ellesmere. Dark rose, with fine white throat...........................1/4oz. 20c... Io
67150 Howard's Star. Rich crimson; distinct white star in center............................1/4oz. 30c... 10
67160 Inimitable, Dwarf. Bushy little plants, covered with masses of star-shaped flowers; 5 to 8 in . pkt., io67170 venosa. Variously colored; beautifully veined1/4oz. 30c.. .IO
67180 White. Pure white; very fine.$1 / 40 \mathrm{oz}$ 30c... 1010
67184 Inimitable, Mixed. Striped and spotted ..... IO
67190 Mixed Single. Very fine colors ..... 10
67200 Variegated Mixed Single ..... 10Collections of Petunias. These contain only fine varieties.
$67250 \quad 6 \quad$ " $67270 \quad 6 \quad . .$.$67290 \quad 6$80
672706 Double Fringed ..... 80

## PHLOX DRUMMONDII (Flame Flower)

The annual Phloxes are dazzling in effect, particularly so when sown in masses or ribbon beds of contrasting colors. Few flowers are so easy to grow from seed, so pretty, and compact in habit, so quick to bloom, or give such a brilliant display of color for so little cost and care. There are few desirable colors beyond their range, and if given good soil and plenty of water, they furnish a long supply of delicate flowers. For pot culture, as trailers, and as an undergrowth for tall, bare-stemmed plants, they are also valuable. The first sowings should be made as soon as the frost is out of the ground in spring, later ones in May, either where the plants are to bloom, or in a seedbed, as the Phlox transplants readily. In transplanting set the taller kinds about a foot apart; if planted too thickly, they suffer from mildew. Cutting away the flowers and seedpods makes the plants more bushy and compact, and lengthens their blooming time. Average height, I foot.
GRANDIFLORA. This section has beautiful, round-petaled flowers, larger than in the older sorts; showy and constant. Our strain is far superior to that ordinarily sold.
67450 alba. Pure white. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . pkt., 10
67460 alba oculata. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67470 atropurpurea. Dark purple. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67480 Chamois-Rose. A soft shade . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67490 coccinea. Large; brilliant scarlet. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67500 Crimson. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67510 Isabellina. Yellow. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10

67530 kermesina splendens. Vivid crimson. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67540 stellata splendens. Star-like; crimson. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
67550 Mixed. Various large-flowering sorts. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 60c.. . 5
SMALL-FLOWERED VARIETIES-
67580 Heynholdi. Scarlet; fine for pots............................................................................. 5


## PHLOX DRUMMONDII, continued

DWARF VARIETIES. Plants of this charming section grow only 6 or 8 inches high, and form dense masses of bloom all summer. They are especially useful for beds, edgings, pots, etc.

| 67670 | Surprise. Brilliant vermilion, |  |
| :---: | :---: | :---: |
|  | star center; for groups and edgings.pkt., 15 | 67730 Fancy Mixed . . . . . . . . . . . . . .1/4oz. $40 \mathrm{c} . .$. . 10 |
| 676 | Snowball. Pure white; fine for pots..... 15 | STAR PHLOX |
| 67690 | Fireball. Bright flame-red; fine for pots. 15 | 67740 cuspidata (Star of Quedlinburg). Star- |
| 67710 | Chamois-Rose. Very fine.............. 15 | shaped; many colors...... $1 / 4 \mathrm{Moz} .3$ |
| 67720 | grandifiora nana compacta. | Collection, including |
|  |  |  |

## PERENNIAL PHLOX

These hardy sorts make bushes about 3 feet high and bear large heads of finely colored flowers.

67840 decussata, Mixed.<br>pkt., 10

67860 Large-flowered Hybrids, Mixed
........... I5

## PINKS (Dianthus)

In this large and greatly varied genus are some of our most beautiful and best-loved flowers, unsurpassed for color and fragrance. They are hardy biennials that bloom finely the first season, remaining green all winter and blooming the next year also, if lightly protected. Old plants flower the earliest, but as young ones give the largest, finest flowers, sowings are made every year. Seed can be sown under glass in the spring, or in an open, sheltered bed. The seedlings are easily transplanted and should stand 8 to 12 inches apart; dwarf ones about 6 inches. If specially large, brilliant flowers are desired, a bed of well-mixed turfy loam, leaf-mold and well-decayed manure should be prepared for them. Average height, I foot.
CHINENSIS (China, or Indian Pinks). The
flowers of all are double and showy. 68000 Double White China Pink........... pkt., 5 68010 " Mixed China Pink. All best colors oz. $40 \mathrm{c} . . \mathrm{S}$ 68020 " Very Dwarf, Mixed (Narcisse).. ıо HEDDEWIGII (Japan Pinks). Unusually large and brilliant; often oddly edged, striped and ringed.
68030 Single Mixed.
nobilis (Royal poz. 50 c . nobilis (Royal Pink). New strain producing very large flowers. See Novelties.... I5

68040

67724 nana compacta hortensifolia. Rose..pkt., I5
67730 Fancy Mixed. ................. . $1 / 4 \mathrm{oz} .40 \mathrm{c}$. . . 10
STAR PHLOX-
67740 cuspidata (Star of Quedlinburg). Starshaped; many colors....... $1 / 4 \mathrm{oz}$. 30c... 10 Collection, including-
67800 12 varieties Phlox Drummondii. ......... . 60

## PINKS, continued

PLUMARIUS (Sweet May Pinks). These are fine, fragrant, perennials of old-time gardens, still reckonedamong the most beautiful for massing and cutting.
68240 Pheasant's Eye. Pretty fringed flowers ..... oz. 30c...pkt., 5
68250 scoticus (Double Scotch Pink). A series of exquisite colors; ours is the finest strain ..... 50
68260 semperflorens (Perpetual Pink). Double, semi-double and single; of various colors ..... 15
68270 Single Pinks, Mixed ..... 10
68280 Double Dwarf, Mixed. Extra fine ..... 10
68284 " Perfection (English Feathered Pink). Produces enormous, perfectly double flowers, clear white in the center of the petal but bordered deep crimson. See Novelties.pkt. of 20 seeds, 25
68290 " and Semi-Double Grass Pinks. Pretty flowers of delicate colors ..... 15
68294 " Mixed. Extra fine. ..... 15
68300 Hybrid Dianthus. A cross between Sweet William and China Pink. Very hardy; beautifully colored and marked; very fragrant. ..... 10
Collection of Pinks, including-
68350 I2 varieties Fine China ..... 50
683608 " " " ..... 40
68370 6 " " ..... 30
POPPY (Papaver)

Before Tulips are fairly gone, our gardens begin to be gay with Poppies. Few flowers have the same grace of stem, airiness of poise and delicacy of tissue. For beds and borders with a background of green there is nothing finer; some sorts are admirable for naturalizing in open wooded grounds; others, like the Shirley, are beautiful for cutting. A sandy loam suits Poppies best, and, as their strong tap-roots are difficult to transplant, it is well to sow seed where the plants are to bloom. Sowings made in fall and at intervals in spring will provide a long succession of flowers. Sow thinly, covering very lightly, and thin the plants to stand about a foot apart. The best plants are those grown from early sowings while the earth is cool and moist.
PERENNIAL VARIETIES. Tall, large-flowered and showy; average height, 2 to 4 feet.
68600 bracteatum. Scarlet; 3 feet. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 30 c. . pkt., 5
68610 Orientale. Enormous flowers of deep, flashing scarlet; entirely hardy anywhere; 3 ft . oz. 75c.. . Io
68614 " Brilliant. Vivid scarlet; beautiful................................................... . oz. 75c... io

68620 " Mixed Hybrids. Finest shades.................................................... . . . . 75. . . 10
68630 nudicaule (Iceland Poppy). These dwarf, bright yellow Poppies form one of the chief attractions of the garden through several months. They are most beautiful when grown in masses from seed sown every year; i ft....................................... . oz. 75c. .
68640 " aurantiacum coccineum. Orange-red. All of this class have crimped petals and peculiar grace.
oz. 75c... 10


ANNUAL VARIETIES. This section includes double and single flowers of greatly varying sizes, selfcolored and daintily edged. All are easily cultivated and greatly admired. Average height, 3 feet.
68670 Thorburn Giant White. White flowers of grand form and size; 3 to 4 ft . . . . . . . . . oz. 30 c. . . pkt., 5
68680 Maid of the Mist. Pure white, single, very large, deeply fringed; 3 to $4 \mathrm{ft} . .$. . . . . . . . . . . . . . . . . . 5
68690 Miss Sherwood. Large; single; satiny white, with upper half of petals chamois-rose. . .oz. 25c. . . 5
68700 Mephisto. Beautifully fringed; varies from red and black to rose and white........... . oz. 25c... 5
68710 Flag of Truce. Pure white; large and showy flowers. ................................... . . . oz. 25c... 5
68720 Shirley. Indescribably bright, dainty and gauzy; a favorite for cutting............... . oz. 40c. . 5
68730 Shirley, Santa Rosa Hybrids. Beautifully crimped petals; wonderful shades of blue, lavender, 1 . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10
68740 glaucum (Tulip Poppy). Striking, tulip-shaped flowers of intensely brilliant scarlet; dwarf..... Io
68750 pavonium (Peacock Poppy). Intense scarlet, with broad bands of purplish black................ 10
68760 umbrosum. Rich crimson, spotted with black. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 5
68770 lævigatum. Scarlet, with white marks at petal bases; very showy................................. 5
68780 Danebrog. Large, single; scarlet with white cross at base of petals. ............................ . . . 5
68790 Mixed Single. All colors. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 2oc. . . . . 5


68850 " Mikado. Large, white flowers, attractively fringed with rose.................. . oz. 25c... 5
68860 " Cardinal. The immense, scarlet flowers last unusually well.................... . oz. 25c... 5
68866 " " Newest Hybrids, Mixed. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 5
68870 " American Flag. White, bordered with scarlet. . . . . . . . . . . . . . . . . . . . . . . . . . . . . oz. 25c... 5
68874 " Carnation-flowered Dwarf cardinale. Cardinal; fine............................. . oz. 25c... 5


SHIRLEY POPPIES
POPPY, continued
68876 Double Carnation-flowered Dwarf cardinale hybridum, White Swan. Pure white..oz. 25c...pkt., ..... 5
68880
68890 ${ }^{6}$ " Pæony-flowered Dwarf Fireball. Double, fringed, colors dazzling... oz. 20c. . ..... 5
5
68900 " "، " Snowball. Pure white very large flowering. ..... 5
68906 " " " Mixed Hybrids. Hybrids of compact growth; splendid oz. 25c... ..... 5
68910 "" " Mixed. Large, handsome flowers of many colors............... oz. 20c... ..... 5
68920 "" Ranunculus-flowered, Mixed. Flowers small, finely formed, double.. oz. 20c.. ..... 5
68926 " Mixed, all sorts oz. 20c. ..... 5
68930 Pæony-flowered, Single White (Opium Poppy). Used for opium. ..... 5
Collections of Poppies, including - Pkt. ..... Pkt.
68980 I2 varieties Double Carnation-flowered. $\$ 040$ 690006 var. Double Pæony-flowered ..... \$0. 25
68990 I2 ..... 40
690106 " Ranunculus-flowered. ..... 25

## PORTULACA

This charming little annual is unrivaled for brilliancy among plants of low growth, and, though it flourishes under almost all conditions, hot sun and a light, sandy soil suit it best. Nothing is prettier for beds, edgings, rockwork, etc. As an undergrowth for taller plants, it is also valuable. Through the driest, hottest seasons it flourishes amazingly, carpeting, the ground with a mat of succulent foliage that, in the forenoon, is hidden by gayest flowers. The seed does not germinate until hot weather, and should be sown late. This plant requires little care and can be transplanted in full flower. Average height, 6 inches.
SINGLE VARIETIES. Each strong plant will cover a space of about 2 feet in diameter.
69100 splendens. Crimson.................pkt., $5 \mid 69140$ aurea. Deep golden yellow...........pkt., 5
69110 Carnation-striped Rose.................... 5 . 59150 Thorburni. Beautiful bright yellow....... 5
69120 Thellussoni. Scarlet....................... . . 5
69160 rosea. Rich rose.......................... 5
69130 albiflora. Pure white....................... $55_{5} 69170$ Mixed.......................................... 6 ... 5
DOUBLE VARIETIES. The flowers are so full and perfect as to resemble tiny roses. Toward the close of the season they will increase in size and beauty. As the full-double flowers do not produce seed, it must be saved from the semi-double flowers growing with the full-doubles. The product of that seed will produce many single flowers. As these bloom earlier, they can be pulled out like weeds. When the full-doubles appear, cuttings can be made from them and the bed extended indefinitely with only full-double flowers. Our strains must not be confused with the ordinary cheap seed usually sold.
69206 "" Carnation-striped ..... pkt., 20
69210 - " Scarlet
69220 " Yellow ..... 2069264 Double Orange.20
69240 " Bright Red ..... 20 ..... 20
69250 " Salmon.
69260 ..... 20
69280 " Golden, Red-striped. ..... 20Collections, including -693408 varieties Portulaca, Single............. 35 | 693506 varieties Portulaca, Double.60

## RICINUS (Castor-Oil Plant)

Picturesquely showy and imposing, the Ricinus gives to the garden magnificent semi-tropical effects. Grown as a specimen, it makes a perfect pyramid of gigantic leaves; a dozen plants in a large bed show a glorious mound of glistening colors and may be admired from a long distance; planted thickly it soon forms a handsome screen or hedge; the lower-growing, dark-leaved sorts are beautiful for dotting here and there among cannas, scarlet pelargoniums, etc. Tall varieties grow from 8 to io feet high, with leaves several feet across and beautifully lobed. Half-hardy annuals.

70150 borboniensis arboreus. Green foliage; 15 feet high...............oz: 20c....pkt., 70160 africanus. Bright colors; 8 ft . .oz. 20c... 5 70170 Gibsoni. Dark red; 5 ft. . . . . . oz. 20 c . . . 5 70176 macrocarpus. Deep purple; 5 ft..oz. 20c... 5 70180 macrophyllus. Dark purple; 6 ft . oz. 20c... 5 70190 Cambodgensis. Glistening dark maroon; stems black; 5 ft .
z. 25c... 70200 hybridus Panormitanus. Cross between Cambodgensis and Zanzibarensis. Huge, dark brown leaves, bluepowdered stem. Upright habit.oz. 40 c . . . 10

70220 philippinensis. Immense leaves; 6 ft . oz. 25c...pkt., 5 70230 " purpureus. Lovely rich purple. . . . . oz. 25c. . . 70236 purpureus. Purple..............oz. 20c... 5 70240 sanguineus. Red stems and seeds; 6 ft . 70244 zanzibarensis. Enormous leaves.oz. 30c.. 5 70250 " Finest Mixed. 8 to io ft .
 Collections, including -
70290 12 varieties Ricinus, choicest sorts....... 45
70300 6 " " " "....... 25

## SALPIGLOSSIS (Painted Tongue)

These showy, half-hardy annuals bear beautiful, funnel-shaped flowers having dark veins on a ground which varies from white to crimson, yellow, orange, etc., and intermediate shades. They are easily grown, require a light, rich, sandy loam and will respond to liberal treatment. Bloom from late summer until frost. 70360 azurea. Blue.
grandiflora. The grandiforas are all splendid large-flowering sorts.
70380
coccinea. Scarlet

70400 rosea. Rose........................................................................................... . . . . .
70410 violacea aureo-venosa. Lilac veined golden yellow...............................................................
70418 Extra Choice Mixed .................................................................................. . . . .
70420 superbissima, Yellow.........................................................................................................................................
70430 " Chamois.............................................................................. I $_{5}$


EMPEROR SALPIGLOSSIS

70440 grandiflora superbissima, Light
Blue........................... 15
70450 grandiflora superbissima, Brown
and Gold...................... 20
70460 grandiflora superbissima (Emperor)
Mixed. Finest strain.
15
70470 Dwarf Mixed........1/40z. 20c.. . 10 70480 Tall Mixed............1/40z. 20c... 10 Collections, including
705208 vars. Salpiglossis, Tall, L'ge-ff'd.. 60
705306 vars. Salpiglossis, Large-flowered Superbissima varieties.
705408 vars. Salpiglossis, Dwarf. ..... 40

## SALVIA (Flowering Sage)

The Salvia splendens is a standard bedding plant that keeps the garden bright with color until late in autumn. For pot culture, for cutting and for borders, etc., it is very valuable. In this climate, sow seed in window-boxes or frames in March or April, and set the plants outdoors the latter part of May; or sow outdoors not before June $\mathbf{1}$, and protect from heavy rains and strong winds. The plants grow and bloom profusely in any light, rich soil. Both the tender and hardy perennial sorts bloom the first year, and all are treated as annuals.
70600 argentea (hP). Silvery leaved; flowers white; blooms in spring; $3 \mathrm{ft} . \ldots . .$. ..................pkt.,
70604 azurea grandiflora (Meadow Sage)
(hP). Sky-blue, blooms in late summer; fine.

## SALVIA, continued

70610 farinacea (hA). Light blue flowers in great abundance; forms a neat bush; $3 \mathrm{ft} . .$. pkt., 10 70620 patens. A handsome, tender perennial, with erect spikes of rich blue flowers in summer. 25 70630 Rœmeriana (hA). Crimson-flowered; very dwarf and of neat habit.

Io
SPLENDENS. These are the well-known bedders, single plants of which carry many long, flaming flower-spikes open at one time, keeping up the display until frost.
70640 splendens grandiflora, Scarlet. A rich-flowered bedder; long spikes; 3 ft .
$1 / 4 \mathrm{oz}$. 50c., oz. \$1.75, pkt.,
Thorburn's Best of All. Intense, bright scarlet spikes, slightly curved upward and borne well above the leaves. The flowers are very large and produced abundantly. The plant grows about $31 / 2$ feet high. spikes, very large, sometimes as much as 18 inches long; compact bushes, 2 to 3 feet high.
Bonfire. Our well-known compact Salvia-the freest blooming of all, seemingly on fire all the time with dense, flaming scarlet spikes; $21 / 2$ feet.... $1 / 4 \mathrm{oz}$. 75 C . . . 10
spikes, similar to No. 70730... Lord Fauntleroy. Only 18 inches high; very compact, with flowerspikes standing clear above the foliage. Fine for bedding in masses or for borders around beds of taller plants; also fine for pots. Very early flowering.. 25

THORBURN'S DOUBLE-FLOWERED MIXED SCABIOSA
 Ball of Fire. Very dwarf and compact, ball-shaped variety, especially suitable for pot culture. The plants are about 2 feet high to the top of the flowerspikes and about the same in diameter. Color dull red; large 25 arly Dwarf Zurich. Grows only 12 to 15 inches high, with many fine, erect slender spikes to each plant borne well above its handsome foliage. Color brilliant scarlet. Earliest of all. scarlet flowers are large and lavishly borne; neat and compact; $21 / 2$ feet.

## SCABIOSA (Mourning Bride, Scabious, etc.)

Well-established garden favorites. They grow about 2 feet high and commence to flower early in July, continuing until frost. The flowers are borne on long stems and last a long time when cut. Fine for beds or for borders. Sow seed outdoors in spring when danger from frost is past.
70810 candidissima fl. pl. (Snowball). Double; white .
pkt., 5
70830 Black-Purple .......................................................................................... . . . . . . . . . . . . . 5
70840 minor aurea fl. pl. Double; beautiful golden yellow................................................ ${ }_{5}$
70850 caucasica (Blue Bonnet) (hP). Lilac; very valuable for cutting................................... 10
70856 atropurpurea maxima. Double mixed......................................................... 10
70860 Mixed Tall. ...................................................................................... . зoc... 5
70870 Dwarf Double Mixed .............................................................................. . 40 ... 5
Collections, including -
70900 го varieties Dwarf Double........................................................................... . . . . . 45
70910 " " " ............................................................................... 30
70920 " Tall, large-flowered. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 40
70930 -" ". ". " ..................................................................... 30


THORBURN'S WHITE, TALL, LARGE-FLOWERING SNAPDRAGON

## SNAPDRAGON

 (Antirrhinum)The Snapdragon is one of our finest perennials, flowering the first year from seed. Its bright-colored, curiously formed flowers always excite interest. Among the newer sorts are flowers of a great variety of colors and markings. Their rich spikes are beautiful for cutting, and keep fresh a long time. From seed sown in the open ground, plants will bloom in July and August. For early flowers, sow under glass in February or March, and transplant into beds of warm, dry soil moderately enriched. The Snapdragon is treated as an annual and the seed sown every year. Average height, $11 / 2$ feet.

## TALL VARIETIES-

71000 album. White . . . . . . . . . . . . . . . . . . . . . . . pkt., 5
71010 luteum. Yellow . . . . . . . . . . . . . . . . . . . . . . . . . . 5
71020 Delicate Rose................................. . . . . . 10
71030 Delicate Rose with White Throat. . . . . . . . . . 10
71200 atrococcineum. Dark scarlet............... . . . 5
71210 Coral-Red. Light scarlet; white throat. . . . . 5
71220 Fairy Queen (Firefly). Orange, white throat. .
71230 Romeo. Violet-rose, with pale lip...........
71240 picturatum, Mixed. Blotched varieties.....
71244 Mixed.................................. . oz. 35c.. .
TALL, LARGE-FLOWERING VARIETIES-
71250 Delilah. White and carmine................. . 10
71252 Blood-Red. Fine color. . . . . . . . . . . . . . . . . . . . 10
71260 Galathee. Crimson and white.............. . . . .
71270 Striped. Odd and pretty..................... . . . 10
71280 Firefly. Scarlet and white.................... . . . 10
71290 White. Beautiful for cutting. .... . . . . . . . . . . 10
71310 Yellow. A pure soft color......... . . . . . . . . . . 10
71320 Queen Victoria. Pure white; superb........ 10
71330 Large-flowered Mixed. Fine... . . . oz. 50c.. . Io
71332 Double White. See Novelties................ . . 25
SEMI-DWARF VARIETIES. Plants of this section make elegant bedders, as they bloom extra profusely and are only about 6 inches high.
71336 BONFIRE. New. Lovely orange-pink.pkt., 15
71338 COTTAGE MAID. New. Pale coral-pink,
white throat................................. I $_{5}$
71340 Black Prince. Nearly black.................... . 10
71360 picturatum. Blotched varieties. . . . . . . . . . . . 10
71370 Grandiflora, Golden Queen. Yellow........ . . 10
71376 Pink Empress. Beautiful dark rose......... 1 Io
71380 Queen of the North. Pure white; small leaved. Io
71390 Fine Dwarf Mixed....................oz. 50c.. . Io
71400 Tom Thumb, Finest Mixed. Very dwarf strain

1/4oz. 40 c . . . 10 Collections, including-
71440 I2 varieties Snapdragon, Finest Tall ....... 45
714506

## STOCKS (Mathiole)

From the general make-up of the great Stock family no desirable quality has been omitted. The plants have good habit, fine leaves, beautiful and fragrant flowers, a long season of bloom and adaptability to many conditions of culture. They are unsurpassed for bedding, edgings, pot culture, and for cutting. For bouquets, etc., the double white sorts are especially useful. For fine early flowers, sow under glass in March or April, transplanting the seedlings when an inch high into other pots or boxes, or into fine soil spread over some discarded hotbed. In May, transfer to garden beds of deep, rich soil, setting the plants about a foot apart. Transplanting several times in the early stages of growth tends to make them more dwarf and compact. For later flowers, sowings may be made in the open ground in May. If plants that begin to bloom late are carefully potted in fall, they will flower finely all winter in a house that is tolerably cool and moist. Average height, I to $11 / 2$ feet.

## STOCKS, continued

GERMAN TEN WEEKS. These are the favorite half-hardy annuals. Our seeds are pot-grown from the choicest double varieties.

Large-flowering Dwarf Pyramidal Earliest of All. For greenhouses in pots or for the open ground. Very large flowers. Snowflake. Pure white............ pkt.,
71520 Delicate Light Rose. 25

71540 Porcelain-Blue. Striking color......... 25
71560 Salmon. Soft, delicate shade. 25
71580 Ruby. Fiery red; splendid color........ 25
71590 Finest Mixture.
71660 Large-flowering Perpetual, "Empress Augusta Victoria." Delicate silvery lilac flowers. Of true pyramidal growth; height, 24 inches
71690 Dresden Perpetual Mixed . . . . . . . . . . . . . . 25
71694 " " White................. 25
71700 "Cut-and-Come-Again." Profuse and perpetual-blooming double white...... 2
71704 Dwarf Large-flowering Perpetual, "Princess Alice." Pure white...............
Dwarf Large-flowering. Long, splendid spikes; large, double.

| 71720 | Snow-White . . . . . . . . . . . . . . . . . . . . . . . 10 |
| :---: | :---: |
| 71730 | Bright Red. . . . . . . . . . . . . . . . . . . . . . . 10 |
| 71734 | Brilliant Yellow. Rose border......... . 10 |
| 71744 | Brick-Red. . . . . . . . . . . . . . . . . . . . . . . 10 |
| 71750 | Crimson |
| 71760 | Blood-Red. Very rich . . . . . . . . . . . . . . 10 |
| 71770 | Carmine . . . . . . . . . . . . . . . . . . . . . . . . 10 |
| 71774 | Rosy Lilac. . . . . . . . . . . . . . . . . . . . . . . 10 |
| 71780 | Rose. Very dainty; light color........ . 10 |
| 71784 | Lavender |
| 71790 | Light Blue. Exquisite . . . . . . . . . . . . . 10 |
| 71800 | Dark Blue. Beautiful. . . . . . . . . . . . . . 10 |
| 71804 | Salmon. . . . . . . . . . . . . . . . . . . . . . . . . 10 |
| 71806 | Yellow, tinted Rose . . . . . . . . . . . . . . . . 10 |
| 71810 | Violet. . . . . . . . . . . . . . . . . . . . . . . . . . . 10 |
| 71814 | Violet-Purple . . . . . . . . . . . . . . . . . . . . . 10 |
| 71870 | Mixed. . . . . . . . . . . . . . . . . .1/40z. \$1 . . 10 |
| 71876 | Giant Pyramidal Perfection Large-flowered Mixed |
| 71910 | Good Mixed Stock. . . . . . . . . . . . oz. \$ I . . 5 |



THORBURN'S DWARF GERMAN TEN WEEKS STOCKS
Wallflower-leaved. The popular cutflower variety; dark glossy leaves.
71920 White; 71930, Crimson; 71940, Mixed.
Each, pkt., 25
71950 Dwarf German Bouquet Mixed......... 25
Emperor, Large-flowering. Sow in spring for autumn and winter flowers; sow in midsummer for spring blooming.
71960 White; 71970,Crimson; 71980, Mixed.
Each, pkt., 25

AUTUMNAL and LATE-FLOWERING SORTS. From seed sown in spring and summer, these halfhardy biennials begin to bloom in fall, flowering all winter and late into spring if transferred to cool, airy quarters indoors. Usually the plants are wintered over in a frame. Nos. 72030 to 72100 , if started in frames or boxes in early spring, will make a brilliant show in late summer and autumn.


## SUNFLOWER (Helianthus. $h A$ )

Very stately, decorative plants with great masses of yellow flowers. Among shrubbery, and for backgrounds and screens, nothing could be finer. Their long stems and wonderful lasting qualities make them valuable as cut-flowers. They are said to be good for absorbing the miasma of low grounds. Plant the seed in the open garden in spring, and thin the plants to stand 3 to 4 feet apart.
72400 argyrophyllus (Texas Silver Queen). Has handsome silvery foliage and a profusion of small, elegant, single flowers. 4 ft .

Oz . Pkt.
72540 Single Russian. Giant-flowered; 5 to 8 ft .


SWEET WILLIAMS

## SWEET WILLIAM

(Dianthus barbatus. hB)
A splendid, old-fashioned plant, producing large heads of beautifully colored, sweetscented flowers in abundance. Hardy, easily grown, flowering the second year from seed.

|  | White, Single $\ldots$. . . . . . $\$ 0.0$ | \$0 ${ }_{\text {Pkt. }}$ |
| :---: | :---: | :---: |
| 72660 | Double | 10 |
| 72670 | Dark Crimson, Single ..... 30 |  |
| 72680 | " " Double |  |
| 72690 | Auricula-flowered oculatus |  |
|  | marginatus (Hunt's |  |
|  | Perfection) ............ 25 |  |
| 72700 | Auricula-flowered oculatus |  |
|  | marginatus, Double. |  |
| 72704 | Pink Beauty (roseus). |  |
|  | Single. Rosy chamois... |  |
| 72710 | Mixed Single |  |
| 72720 | " Double.1/402. 30c. |  |
| 72750 | Coliection of 6 varieties. | 25 |

## VERBENA ${ }_{(h a)}$

In rich soil, single plants of this pretty annual creeper will carpet a space 3 to 4 feet in diameter. For beds, borders, mounds, win-dow-boxes, etc., it is particularly fine, and is frequently used as an undergrowth to tall plants like lilies. Plants raised from seed are cheaper, more vigorous and produce more flowers than those grown from cuttings. For early spring bloom, sow under glass in February; for later flowers, sow in March or April. Soak the seed a few hours in tepid water and sow in boxes filled with light, rich soil; cover one-fourth of an inch deep, press down firmly and water sparingly. When the seedlings are about an inch high, transplant into other boxes. Use a liberal amount of manure in the beds, and set out to to 15 inches apart each way in May in a sunny situation. The plants bloom from early summer until frost. Nos. 73076 and 73140 require no pegging down.
73000 hybrida, Scarlet. Different shades ..... IOVERBENAS, continued
73010 Defiance. Intensely brilliant scarlet; fine for bedding.
73020 " Black-Blue, White Eye ..... Io
73030 " Yellow. Primrose-color ..... ı
73040 " candidissima. Large trusses of purest white flowers ..... ı
73050 " auriculæflora. Brilliantly colored flowers of fine size, each with a large white eye. ..... ı
73060 " italica striata. Brightly striped ..... Io
73070 " cœrulea. Bright blue in various shades ..... 10
73076 " nana compacta Vesta. Large; carmine-scarlet flowers with white centers; very showy;dwarf. Forms pretty, round bushes of upright growth.
15
73080 " Mixed 1/4oz. 20c. ..... 5
73090 " Finest Mixed. Extra choice. 1/4oz. 30c. ..... 10
73094 " Mammoth Rose Queen. Brilliant rose-colored flowers, I to $\mathrm{I} 1 / 4$ inches across whenwell grown, produced in magnificent large umbels.25
73100 "" Mammoth Mixed. Plants and flowers are unusually large; extremely floriferous ..... 10
73110 " Improved Mammoth Mixed Auricula-flowered. Best of all. ..... 25
73120 " gigantea (Giant-flowered). Enormously large with brilliant white eyes; very striking.A splendid mixture of rich colors, with a large percentage of reds in various shades,such as Tyrian-rose, purple-garnet, turkey-red, geranium-red, etc..25
73140 compacta erecta, Mixed. Finest collection.. ..... Io
73150 Collection, including 6 varieties Verbena hybrida ..... 50
73200 Verbena erinoides. Small, violet; large bloomer; pretty. ..... Io
73210 " " alba. Dazzling white; large, profuse bloomer; excellent ..... Io
73214 "" venosa. Blue; fine for groups and for edgings. ..... Io
73220 citriodora (Lemon-scented Verbena). An attractive greenhouse shrub, grown for thedelightful citron scent of its light green leaves.IO

## ZINNIA (Youth and Old Age)

Few flowers are so easily grown from seed sown in the open ground, or bloom so abundantly and continuously, as this hardy annual. During the month of August, Zinnias are almost incomparably bright. Sow seed in the open ground early in spring. The separate colors and collections offered below are very choice. They produce very large flowers and are far superior to the sorts generally sold as Giant-flowering. Average height, $1 / 2$ to 2 feet.
TALL DOUBLE. For borders and groups; 2 feet.

| 73510 | Carmine | \$0 40 | \$0 05 |
| :---: | :---: | :---: | :---: |
| 73520 | Crimson | 40 |  |
| 73530 | Flesh-colored | 40 |  |
| 73540 | Lilac | 40 |  |
| 73550 | Purple | 40 |  |
| 73560 | Rose | 40 |  |
| 73570 | Scarlet | 40 |  |
| 73580 | Striped | o |  |
| 73600 | White | 40 |  |
| 73610 | Yellow, Sulphur | 40 |  |
| 73620 | Golden. | 40 |  |
| 73622 | Giant Sul.-Yellow |  |  |
| 73624 | " Crimson... | Superb flow- | 15 |
| 73626 | ". Violet. | ers. See | 15 |
| 73628 | " Flesh-color | Novelties. | 15 |
| 73632 | "، Mixed..... |  | 15 |
| 73636 | Mixed. | 40 |  |
| 73640 | Large Robus | st........... $5^{0}$ | 10 |





THORBURN'S SPENCER SWEET PEAS

## Sweet Peas

## (Latbyrus odoratus. hA.)

N. B.-Sweet Peas, owing to the extremely short crops last year, are very scarce, and, whilst the prices quoted are not firm, we shall endeavor to adhere to them as long as we can. Intending purchasers are strongly advised to order as soon as possible after receipt of catalogue. It will be difficult to replace the seed when our supply is sold.
Through the skill of specialists, the Sweet Pea has become much larger and lovelier than before it became so popular. There are flowers of quite distinct shapes, some of which are a great improvement upon the Sweet Pea of the old type. For garden decoration it is now grown in clumps, and in separate colors. The plants are more robust, dwarf, branching and bloom more freely, some varieties showing three to four blooms on a stem.
A deep, rich, moist soil is best suited to Sweet Peas, hence a trench should be dug $\mathrm{I} 1 / 2$ feet deep and filled with very best loam mixed with bone meal or well-rotted stable manure. The vines are usually grown in double rows, with a wire trellis or a row of brush between. For each double row make the drills about 6 inches deep, and 9 or io inches apart. Sow plentifully, covering about 2 inches deep, and, by degrees, as the vines grow up, fill the trenches with soil, and thin out to about 2 or 3 inches apart. Spring sowings should be made just as early as the ground can be prepared. The earliest flowers are from seed sown in fall, preferably in a dry situation, and 6 or 8 inches deep, giving them level culture. Sweet Peas should not be grown on the same soil year after year. If the location cannot be changed, the soil to the depth and width of a foot or so should be removed and replaced by soil from another part of the garden or grounds. If the soil is in good, rich condition, bone meal is the best fertilizer.

Thorburn's Selected Sweet Peas


## NAMED LARGE-FLOWERED (GRANDIFLORA) VARIETIES

## Free by mail or express

All five cents per packet, except where quoted otherwise

Per oz. 1/4lb. 1/2lb. Lb.
74070 Admiration. Self-colored in a delicate shade of mauve. . . . . . . . . . . . . . . \$0 15 \$0 40 \$0 65 \$1 00
74080 Agnes Johnston. Rose-pink, shaded cream. . . . . . . . . . . . . . . . . . . . . . . . . . . . . 10 30 $30 \quad 50 \quad 80$
74130 Apple Blossom. Bright pink and blush, beautifully shaded. . . . . . . . . . . . . . 10 . $30 \quad 50 \quad 80$
74140 Aurora. Flowers extra large; flaked bright orange-salmon on white ground. I5 $40 \quad 40 \quad 65 \quad$ I 00
74150 Black Knight. Deep maroon, self-colored............................. . pkt. Ioc. 25

| 74160 Blanche Burpee. Superb; pure white; immense size; perfect form........... 15 | 40 | 65 | I 00 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |


|  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| All five cents per packet, except where quoted otherwise |  |  |  |  |
| 74170 | Blanche Ferry. Standard carmine-rose, wings white, tinged pink. | 15 \$0 40 |  | \$ |
| 74180 | Bolton's Pink. Rich salmon-pink | 1025 | 45 | 75 |
| 74200 | Captain of the Blues. Bright purple and | - 65 | oo | I 50 |
| 74210 | Captivation. Standard pure magenta, wings almost self-colored, distinct shade. | 1030 | 50 |  |
| 74240 | Countess of Cadogan. Reddish mauve standard, violet-blue wings. | 1025 | 45 |  |
| 74250 | Countess of Lathom. Very pretty cream-pink. | 1540 | 65 |  |
| 74254 | Countess of Powis. Orange | 1540 | 65 |  |
| 74270 | Crown Jewel. Primrose, veined | 20 | 35 |  |
| 74280 | Dainty. White, edged p | 1020 | 35 |  |
| 74284 | David R. Williamson. Bright indigo; wings li | 15 | 65 |  |
|  |  |  |  |  |
| 74290 | Dorothy Eckford. Fine pure white; large | 1025 | 45 |  |
| 74300 | Dorothy Tennant. Standard rosy mauve; wings | 1540 | 65 |  |
| 74310 | Duke of Clarence. Rosy claret, self-colored flowers; | 1025 | 45 |  |
| 74320 | Duke of Westminster. Rosy maroon standard; violet | 1540 | 65 |  |
| 74360 | Emily Henderson. Splendid pure white; good for for | $10 \quad 25$ | 45 |  |
| 74380 | Firefly. Brilliant fiery scarlet | O 20 | 35 |  |
| 74404 | George Gordon. Reddish maroon | 1020 | 35 |  |
| 74420 | Golden Rose. Light primrose-yellow, strip | 25 | 45 |  |
| 74436 | Gray Friar. Heliotrope-marbled | 25 | 45 |  |
|  | Helen Pierce. Bright blue-mottled on pure white; perfect, shell-shaped, gloxinia-like flowers; beautiful. |  |  |  |
| 74454 | Her Majesty. Rose-crimson | 1025 | 45 |  |
| 74460 | Hon. F. Bouverie. Standard flesh-pink; |  |  |  |
| 74500 | Jeannie Gordon. Beautiful bright rose, sha | $10 \quad 25$ | 45 |  |
| 74510 | Jessie Cuthbertson. Rose and primrose stri |  |  |  |
| 74520 | Katherine Tracy. Soft, brilliant pink | 15 40 | 65 |  |
| 530 | King Edward VII. Bright crimson; very large flowers. | 1025 | 45 |  |
| 74540 | Lady Grisel Hamilton. Light lavender standard, sky-blue wings; splendid.. | $10 \quad 25$ | 45 |  |
|  | Lady Skelmersdale. Light magenta standard, edged lilac; wings white though sometimes tinged pink |  |  |  |
|  | Lord Nelson (Brilliant Blue). Deeper and richer shade than Navy-Blue. | 1545 | 75 |  |
| 74564 | Lord Roseberry. Bright magenta-rose; large size | 10.25 |  |  |
| 74570 | Lottie Eckford. Rose and white, edged with blu | 1020 | 35 |  |
| 74590 | Maid of Honor. Almost white, with light bluish lavender | 1020 | 35 |  |
| 74600 | Majestic. Deep pink, self-colored; very large flowers of finest $f$ | O 20 | 35 |  |
| 74610 | Marchioness of Cholmondeley. Light salmon, buff standards and |  |  |  |
|  |  | 2565 |  |  |
| 74620 | Mars. Bright red, self-colored; hood | 1540 |  |  |
| 74630 | Miss Willmott. Large; orange-pink | 1025 | 45 |  |
| 640 | Modesty. White, tinted pink | $10 \quad 25$ | 45 |  |
| 74680 | Mrs. Jos. Chamberlain. White, striped and flaked with bright | 1020 | 35 |  |
| 74690 | Mont Blanc. Pure white, of finest form; for forcing; very dwarf | $10 \quad 25$ | 45 |  |
| 74700 | Navy-Blue. Bluish purple standard; navy-blue wings ......... . pkt. Ioc | 2565 |  |  |
| 74746 | Prima Donna. Pure light pink, self-colored................... . . pkt. 100 | 2565 |  |  |
| 74760 | Prince of Wales. Rose-crimson, self-colored | 1025 | 45 |  |
| 74770 | Princess of Wales. Striped mauve on white gro | $10 \quad 25$ | 45 |  |
| 74802 | Royal Robe. Pure pink, self-colored | 2065 |  |  |
| 74810 | Royal Rose. Fine deep rose-color | 25 | 45 |  |
| 74820 | Sadie Burpee, White Seed. One of the largest pure white Sweet Pe | 1020 | 35 |  |
| 74830 | Sadie Burpee, Black Seed. Pure white; hardier than the white-seed | ı | 35 |  |
| 74850 | Senator. Maroon and violet, striped white | 1025 | 45 |  |
| 74854 | Sensation. Standard light pink and buff; wings | 1025 | 45 |  |
| 74860 | Shahzada. Dark maroon, shaded purple | 1540 | 65 |  |
| 74864 | Shasta. Pure white; very large, open form | 10.25 | 45 |  |
| 74880 | Stella Morse. Primrose, flushed pink; very | 1025 | 40 |  |
| 4900 | Sibyl Eckford. Standard light salmon and buff, wings buff; | 1540 | 65 |  |
| 74908 | Wawona. Lavender-striped | 10 25 | 40 |  |
| 74910 | White Wonder. Double-stemmed; many-flowered; pure white | 10 25 | 45 |  |

## UNWIN VARIETIES

This type has waved and fluted standards, much resembling the Spencers, though entirely distinct.


## SPENCER VARIETIES

These are noted for their unusually large-sized flowers, and for the waved or fluted appearance of the petals. They are also frequently referred to as "Orchid-flowering Sweet Peas."

All ten cents per packet, except where quoted otherwise

74996 Asta Ohn. Lavender, tinted mauve; delicate coloring; very large.............35 3 I 20 20 200
75004 Aurora. Orange, pink-and-white striped; enormous flowers. .................. 35 I $125 \quad 2 \begin{array}{llllll}25 & 25 & 4 & \text { oo }\end{array}$
75006 Black Knight. Shining deep maroon............................................. 30
75008 Beatrice Spencer. Deep pink, blush and buff; splendid........................ 35 I 125
75012 Captain of the Blues. Standard purple; wings blue........................... 35 I 25 I 2525 4 oo
75018 Clara Curtis. Beautiful pale primrose......................................... 25
75020 Countess Spencer. Soft rose-pink, a little deeper at edges................... 35 I 125 I $225 \quad 4$ oo
75022 Elsie Herbert. Large; creamy white, with pink edge.......................... 25 . 75 I $25 \quad 2$ oo

75026 Etta Dyke. Pure white; exquisite................................................. 30
75028 Florence Morse. Blush, pink margin............................................ 35
75034 George Herbert. Standard rosy magenta; wings deep carmine............... 30 , 30
75040 Helen Lewis. Crimson-orange standard; wings orange-rose................. 35 I $125{ }_{2} 25 \quad 4$ oo

75052 King Edward VII. Rich carmine-scarlet; sun-proof............................ .

75056 Mrs. C. W. Breadmore. Buff ground, with rosy picotee edge................. 35 I 20 I 200
75058 Mrs. Charles Foster. Lavender, flushed pale rose............................. 3
75060 Mrs. Hardcastle Sykes. Salmon-pink...........................................
75064 Mrs. Henry Bell. Rich apricot-pink on cream ground........................... 35 I 20 I 20 oo 350
75068 Othello. Rich, deep maroon; profuse bloomer...................pkt. 15c... 50
75072 Paradise Ivory. Ivory-white with a slight tinge of buff on the standard.... 35 I 125
75076 Primrose Spencer. Pronounced primrose- or creamy yellow................. 30
75080 Tennant. Purplish mauve, self; long, stiff stems....................pkt. 15c... 45
75084 The Marquis. Rosy mauve, self.

| I | oo | I | 75 | 3 | 00 |
| :--- | :--- | :--- | :--- | :--- | :--- |
| I | 65 | 3 | oo | 5 | 50 |
|  | 1 | 1 | 0 |  |  |

75088 White Spencer. Pure white; waved, crinkled and fluted standards. pkt. 15 c .... 50 I
75090 Mixed Spencers........................................................................ 30 I 00

## CHRISTMAS SWEET PEAS

These varieties, if sown early in fall indoors, will bloom by Christmas and continue all winter. They may also be sown outdoors in the same way as other sorts for summer-flowering. Per oz. $1 / 4 \mathrm{lb}$. $1 / 2 \mathrm{lb}$. Lb . 75100 Angeleno. Self-pink

| .pkt. 5c. | 15 | 45 | 75 | I 25 |
| :---: | :---: | :---: | :---: | :---: |
| .pkt. Ioc. | 30 | $1{ }^{1}$ |  | 50 |
| pkt. 5c.... | 15 | 45 | 75 | 25 |
| .pkt. Ioc. | 30 | 100 | 50 | 50 |
| pkt. 5c. | 15 | 45 | 75 | 25 |
| .pkt. Ioc. | 30 | 100 |  |  |
| pkt. 1 | 25 | 65 | 1 oo |  |

## SWEET PEAS IN MIXTURE

75150 THORBURN'S SPECIAL MIXED. Comprising the finest Eckford and other newest and best large-flowering varieties................pkt. 5c...
75160 Eckford's Mixed Composed of Eckford varieties only
mosed of Eckford varieties only
DWARF CUPID SWEET PEAS
A distinct race of Sweet Peas, growing only about 6 inches high. Of compact, bushy habit, and with flowers as large and fragrant as those of some of the tall sorts. Excellent for pots, borders or masses.


## PERENNIAL PEAS (Lathyrus latifolius)

These have not the fragrance of Sweet Peas, but bloom through a long season, are hardy and will live for years. They make a beautiful screen for rocks, stumps, fences, etc. Height, 2 to 8 feet. Pkt. Oz. 75420 latifolius Crimson (hP). Beautiful shade.............................................. \$o io
75450 ". Pink Beauty (hP). Blossoms white, veined, edged and shaded rose-pink...... 10 40
75460 " White (hP). Valuable for cut-flowers in midsummer........................... 10 . 40

## LORD ANSON'S PEAS (Lathyrus magellanicus. ha)

Said to have been originally introduced by the cook of H. M. S. Centurion, commanded by Lord Anson in 1744. Medium-sized flowers produced in bunches from June until end of July. 75470 Blue. Strong growing; dark purple-blue. 3 to 5 feet

75480 White. A pretty white form of above

# Continuation of Flower Seeds, General List 

FLOWER SEEDS DELIVERED FREE BY MAIL, ON RECEIPT OF THE STATED PRICE. PRICE PER OUNCE OR POUND FOR THOSE NOT QUOTED, ON APPLICATION

Not less than one ounce at ounce rate, on the cheaper articles quoted

## Explanation of Signs Employed in this List

The asterisk ${ }^{(*)}$ designates ornamental-leaved plants. This mark ( $\ddagger$ ) prefixed indicates the climbers. The third column presents in figures the comparative time of flowering, thus: I designates early-blooming in spring and early summer.

2 designates intermediate-blooming in midsummer. 3 designates late-blooming in late summer and autumn.
The fourth column gives the duration or character, and hardiness.

| A | Annual-lasting but one year. | ts Shrubs-plant |
| :---: | :---: | :---: |
| P | Biennial-lasting two years. |  |
| E | Evergreen-retains foliage the entire ye | signates, in every case, r |

As a large number of Biennials and Perennials, if sown early, flower the first season from seed, this distinguishing mark ( $\dagger$ ) is affixed to such.

The hardiness is denoted by the following abbreviations, but it should be understood that this is intended to apply to the climate of the Middle Atlantic states. Farther north or south, these designations apply only in a comparative way.
$h$ represents hardy-plants for open border. hh represents half-hardy-plants that require to be forwarded in pots or frames. t represents tender-requiring protection.
Customers will find it more convenient to order by number. This will facilitate the filling of their orders and will insure prompter shipment.







120 J. M. THORBURN \& CO., 33 BARCLAY ST., NEW YORK

| Not $l$ | NUMBER AND NAME <br> less than one ounce of the cheaper sorts at ounce rate | Time of Flowering | Hardiness and Duration | Color of the Flower | $\begin{aligned} & \text { Height } \\ & \text { in } \\ & \text { Feet } \end{aligned}$ | Price <br> per <br> Packet | GENERAL OBSERVATIONS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 80340 | Doronicum caucasicum | 12 | hP | yello | 2 | $\begin{array}{r} \text { cts. } \\ 25 \end{array}$ | Large yellow flowers. |
| $\begin{aligned} & 80360 \\ & 80380 \end{aligned}$ | *Dracæna Draco . <br> *indivisa lineata.... 100 seeds, 50 oc . | 2 . | gP | white | IO | 25 10 | $\left\{\begin{array}{l} \text { See Cordyline. Ornamental } \\ \text { greenhouse plants, with ele- } \\ \text { gant leaves; very rich and } \\ \text { desirable. } \end{array}\right.$ |
| 80410 | Dracocephalum m | 3 | $\dagger \mathrm{hP}$ | blue | 2 | 5 | (Balm.) Fine for bees. |
| $\begin{aligned} & 80430 \\ & 80440 \\ & 80450 \end{aligned}$ | Echeveria secunda metallica. . . . . . agavoides..... | . ${ }^{2}$ | gP | yellow | $\frac{1}{4}$ | $\begin{aligned} & 25 \\ & 25 \\ & 25 \end{aligned}$ | $\begin{aligned} & \text { Interesting greenhouse succu- } \\ & \text { lents; largely used for "car- } \\ & \text { pet" bedding. } \end{aligned}$ |
| 80500 | $\ddagger$ Echinocystis lobata . . . oz., 30 c |  | hP | gr | 12 | 5 | (Wild Cucumber.) |
| 80520 | Echinops Ritro Edelweiss.... |  |  | blue | 2 | 10 | $\begin{aligned} & \text { Fine for bees. } \\ & \left\{\begin{array}{c} \text { See Leontopodium alpinum, } \\ \text { page } \mathbf{I} 24 . \end{array}\right. \end{aligned}$ |
| 80540 | Elsholtzia cristata |  | hA | lilac | 1 $\frac{1}{2}$ | 10 | Fine for bees. |
| 80560 | Emmenanthe pendulif |  |  | yello | I | 25 | ("California Golden Bells.") |
| 80580 | Epacris hybrida super | 12 | gS | mixed | div. | 50 | Free-blooming, like Heath. |
| 80600 | Eremurus himalaicus |  | hhP | white | 7 | 25 | Strikingly handsome. |
| 80620 | Erica (Heath), Finest Mixe |  | gS | mixe | 2 | 25 | Charming greenhouse shrubs. |
| 80640 | Erigeron aurantia |  | hP | orange | I | 10 | (Double Orange Daisy. |
| 80660 | Erinus alpin | 2 |  | blue | $\frac{1}{4}$ | 25 | Beautiful for basket |
| $\begin{aligned} & 80680 \\ & 80690 \end{aligned}$ | Eryngium co giganteum | 23 |  |  | $1 \frac{1}{2}$ | 10 | Beautiful sky-blue flowers. (Silver Thistle.) |
| $\begin{aligned} & 80710 \\ & 80720 \end{aligned}$ | Erysimum arkansanum.oz.,25c. <br> Perofskianum . . . . . . .oz.,25c. | 12 | hA | yellow orange |  | 5 | Free-flowering; of bright col\} ors and neat habit. |
| 80740 | Erythrina Crista-galli ......... | 23 | gS | scarlet |  | 10 | $\left\{\begin{array}{c} \text { (Coral Tree.) Fine greenhouse } \\ \text { shrub. } \end{array}\right.$ |
|  |  |  |  |  |  |  | See page 89 |
| 80760 | Eucharidium grandiflorum | 12 | hA | ro | I | 5 | $\left\{\begin{array}{c}\text { Graceful little plant. Fine for } \\ \text { edging and pots. Showy. }\end{array}\right.$ |
| 80790 | Eupatorium | 3 |  | white |  | 10 | Fine for cutting. |
| 80810 | *Euphorbia marg |  | hA |  | 2 | 5 | $\left\{\begin{array}{c}80830 \text { if started in frames and } \\ \text { set out in the spring will }\end{array}\right.$ |
| 80820 | heterophylla | 23 |  | carmine |  | 10 | set out in the spring will |
| 80830 | pulcherrima (Poinsettia) |  | gS | ver. red | 2-6 | 25 | Most valuable for cutting. |
| 80860 | Eutoca mu |  | hB | pink | I | 5 | ] Good serviceable flowering |
| $\begin{aligned} & 80870 \\ & 80890 \end{aligned}$ | viscida <br> Mixed | 13 | hA | blue mixed |  | 5 | \} plants for bedding; freeblooming. |
| $\begin{aligned} & 80910 \\ & 80920 \end{aligned}$ | Fenzlia dianthiflora -alba. |  |  | rose white | . ${ }^{\frac{1}{4}}$ | $\begin{aligned} & 25 \\ & 25 \end{aligned}$ | \}For ribbon gardening or pots. |
| 80930 | Ferns, Mixed. For greenhouse Collection, including 12 of the finest sorts |  | gP |  |  | 25 \$1 25 | $\left\{\begin{array}{l}\text { Sow in fine, sifted, sandy, peaty } \\ \text { loam, covering the pots with } \\ \text { pieces of glass. }\end{array}\right.$ |
|  | Feverfew <br> Flax <br> Forget-me-not (Myosotis) |  |  |  |  |  | See Matricaria, page 125. See Linum, page 124 . See page 89 . |
| 80970 | Four O'clock, Hybrid. .oz., 20c. |  | hA | mixed | 2 |  | (Mirabilis.) Called Four |
| 80980 | longiflora alba.... . . . oz., 25 c . |  |  | white |  | 5 | O'clocks because they open |
| 80990 | Variegated-leaved . . oz., 20c. | 23 |  | mix |  | 5 | their blossoms at that hour |
| 81000 | Tom Thumb, White.oz., 30c. |  |  | white | I | 5 | in the afternoon. They are |
| 81010 | Collections, including-o., 30 C |  |  | mixed |  | 5 | also known as "Marvel of Peru." Handsome, free- |
| 81030 | 12 vars. Four O'clock |  |  |  |  | 45 | owering, sweet - scented; |
| 81040 81050 | $\begin{array}{llll} 6 & " & " & \text { " } \\ 6 & \text { " } & \text { " } & \text { Stripe-l’vd } \end{array}$ |  |  |  |  | 30 25 | blossoms variegated, striped and of various colors. |
|  | Foxglove |  |  |  |  |  | See page 90 |
| 81070 | Fragaria indic | 12 | hP | yellow | trai. | 10 | Beautiful scarlet fruit. |
| $\begin{aligned} & 81090 \\ & 81096 \end{aligned}$ | Freesia refracta Mixed $\qquad$ | 3 | $\mathrm{gBu}^{\text {. }}$ | white mixed | . | 5 | \}Very sweet-scented flowers. |











| Not | NUMBER AND NAME <br> less than one ounce of the cheaper sorts at ounce rate | Time of <br> Flowering | Hardiness <br> and <br> Daration | Color of the <br> Flower | $\begin{gathered} \text { Height } \\ \text { in } \\ \text { Feet } \end{gathered}$ | Price <br> per <br> Packet | GENERAL OBSERVATIONS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{aligned} & 87570 \\ & 87590 \end{aligned}$ | Stephanophysum longifolium. <br> Stevia serrata .............. . <br> Stocks, German Ten Weeks | 23 | hhP gP | scarlet <br> flesh | I ${ }^{\frac{1}{2}}$ | 25 | \{ An acanthaceous plant, with \{ bright colored flowers. Fine for bouquets; scented. See page 106 . |
| 87610 | STOKESIA Cyanea <br> Streptocarpus- | 23 | hP | blue | 2 | 10 | ("Cornflower Aster.") Pretty. \{Very ornamental, profuse- |
| 87630 | Veitch's Hybrids . . . <br> Sunflower (Helianthus) | 12 | gP | mixed |  | 50 | $\{$ blooming greenhouse plants. See page 108. |
| $\begin{aligned} & 87670 \\ & 87680 \\ & 87684 \end{aligned}$ | Swainsonia alba grandiflora Ferrandi carminea Mixed Species | $\begin{array}{ll} \text { I } & 3 \\ . \end{array}$ | $\bullet \cdot$ | white carmine mixed |  | $\begin{aligned} & 25 \\ & 50 \\ & 20 \end{aligned}$ | Fine greenhouse plants, easily grown in sandy, peaty soil. |
|  | Sweet Peas.. Sweet Sultan Sweet William |  |  |  |  |  | See page ino. <br> See Centaurea, page 84. <br> See page 108. |
| $\begin{aligned} & 87720 \\ & 87730 \end{aligned}$ | Tagetes lucida. Sweet-scented signata pumila. <br> Tassel Flower | $2 \begin{aligned} & 2 \\ & 2\end{aligned}$ | hA | yellow | . ${ }^{\text {I }}$ | 10 | Pretty, and fine for edging. See also Marigold, page 80. See Cacalia, page in6. |
| 87750 | Tecoma Smithi. Sple |  | gP | lemon | 6 | 25 | Flowers lemon, flushed orange. |
| 87830 | $\ddagger$ THUNBERGIA alata, Mixed | 12 | hhA | mixed | 5 | 10 | ) Ornamental climber and \} abundant bloomer. |
| $\begin{aligned} & 87850 \\ & 87860 \\ & 87870 \end{aligned}$ | Torenia Fournieri . -"White Wings' Bailloni ........ | . ${ }^{\text {c }}$ | tA | purple white yellow | . ${ }^{2}$ | 25 25 25 | $\left\{\begin{array}{l} \text { For borders and baskets. } 87850 \\ \text { is fine for pots. } 87870 \text { is golden } \\ \text { yellow, deep red throat. } \end{array}\right.$ |
| 87890 | Trachelium cœruleum | 2 | $\dagger \mathrm{hP}$ | blue | $\frac{1}{2}$ | 10 | Useful; border or greenhouse. |
| 87910 | Trachymene cœrulea (Didiscu |  | hA |  |  | 5 | Fine, long-blooming annuals. |
| $\begin{aligned} & 87930 \\ & 87940 \\ & 87950 \end{aligned}$ | $\ddagger$ Trichosanthes colubrina coccinea...........$~$ | 3 2 3 | tA | white <br> yellow <br> white | 15 | 10 | $\begin{aligned} & \text { (Snake Gourd, or Serpent Cu- } \\ & \text { cumber.) So called from the } \\ & \text { shape of its fruit. } \end{aligned}$ |
| 87970 | Trifolium suaveole | 2 | hP | purple | trai. | 5 | An ornamental clover. |
| $\begin{aligned} & 87990 \\ & 88000 \end{aligned}$ | Tritoma Uvaria grandi MacOwani . . | 23 | hhP | or.-red <br> r. \& yel. | + ${ }^{\frac{1}{2}}$ | 10 | $\} \begin{aligned} & \text { (Red-hot-poker Plant.) } \\ & \text { showy spikes of bloom. } \end{aligned}$ |
| 88020 88040 | Trollius, Mixed Hybrids . . . . . | 12 | hP | mixed |  | 10 | $\left\{\begin{array}{l} \text { (Globe Flower.) For beds or } \\ \text { borders. } \end{array}\right.$ |
| 88040 | $\ddagger$ TROPEOLUM canariense ... oz., 30 c . | 2 | hhA | yellow | 10 | 5 | $\left\{\begin{array}{c}88040 \text { is theCanary-birdFlower. } \\ \text { The others are fine for pot }\end{array}\right.$ |
| 88050 | pentaphyllum. |  | gP | or. \& y. |  | 15 | culture. See, also, Nastur- |
| 88060 | tricolor grandiflorum |  |  | r |  | 25 | tium, pages 95 and 96. |
| 88080 | Tunica Saxifraga | 2 | hhP | white | I | 5 | Pretty for rockwork. |
| 88100 | Tydæa hybrida grandiflora |  | g P | mixed |  | 50 | Popular greenhouse plan |
| $\begin{aligned} & 88120 \\ & 88130 \end{aligned}$ | Valeriana alba rubra .... | 12 | $\dagger$ ¢ B | white red | 3 | 5 5 | $\left\{\begin{array}{l}\text { Fine border plants; sweet- } \\ \text { scented flowers. }\end{array}\right.$ |
| 88160 | Venidium calendulaceum | 23 | hhA | orange | 1 | 5 | $\left\{\begin{array}{c}\text { Beautiful for borders or pots. } \\ \text { Flowers the entire season. }\end{array}\right.$ |
| 88180 | VENUS' LOOKING-GLASS ... | 12 | hA | blue | $\frac{3}{4}$ |  |  |
| 88190 | White . . . . . . . . . . . oz., 30c. |  |  | white |  | 5 | (Specularia.) Pretty edging |
| 88200 | Double Blue . . . . . $\frac{1}{4}$ oz., 20 c . |  |  | blue |  | IO | plant. 88200 gives about $5^{\circ}$ |
| 88210 | Mixed |  |  | mixed |  | 5 | per cent of double flowers. |
| 88214 | grandiflora, Mixed. Largeflowered |  |  |  |  | 5 |  |
| 88220 | Venus' Navelwort (Cynoglossum linifolium) ........oz., 25 c . | 2 |  |  | 1 | 5 | $\left\{\begin{array}{l} \text { A handsome border flower. } \\ \text { Easily grown. } \end{array}\right.$ |
| 88240 | Verbascum pannosum Verbena hybrida Verbena (Aloysia) citriodora |  | hP | yellow | 5 | 10 | Decorative plant. Woolly lvs. See page rog. See page 109. |
| 88280 | Veronica, Mixed |  |  | mixed | $\frac{1}{2}$ | 10 | Pretty for borders; fine colors. |
| 88300 | Vicia Gerardii | 23 | hA | violet | 4 | 5 | Pretty pea-shaped flowers. |
| 88330 | VINCA alba. Pure white. |  | tP | white | I | 10 |  |
| 88340 | rosea. |  |  | rose |  | 10 | Fine for conservatory, parior windows and borders or |
| 88350 88360 | - Mixed |  |  | ro. \& w. mixed |  | 10 | beds; very pretty. |



## MIXED ANNUALS FOR WILD GARDEN, ETC.

Bright-colored, summer-flowering, easily grown hardy annuals in the greatest variety for sowing broadcast.
88950 Mixed Tall. Per oz., Io cts.; $1 / 4 \mathrm{lb}$., 30 cts.; $1 / 2 \mathrm{lb} .55$ cts.; lb., $\$ \mathrm{r}$, postpaid.
88960 Mixed Dwarf and Semi-dwarf. Per oz., ıo cts.; $1 / 4 \mathrm{lb} .30$ cts.; $1 / 2 \mathrm{lb} .55$ cts.; lb., $\$ \mathrm{I}$, postpaid.
88980 Mixed Annuals for Bees. Per oz., 10 cts.; $1 / 4 \mathrm{lb} ., 30 \mathrm{cts} . ; 1 / 2 \mathrm{lb} ., 55 \mathrm{cts} . ; \mathrm{lb} ., \$ \mathrm{I}$, postpaid.

## LIST OF EVERLASTING FLOWERS

Acroclinium
Ammobium

Helichrysum Helipterum

Palafoxia
Rhodanthe

## ORNAMENTAL GRASSES

Many of these Grasses, if cut before they are entirely ripe, will be found useful in the formation of winter bouquets, in connection with the Everlastings.

| NUMBER AND NAME <br> Not less than one ounce of the cheaper sorts at ounce rate | Time of <br> Flowering | Hardiness <br> and <br> Duration | Color of the Flower | Height <br> in <br> Feet | Price <br> per <br> Packet | GENERAL OBSERVATIONS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 89000 *Agrostis nebulo 89010 pulchella 89020 minutiflora | .$^{2}$ | hA | apet. |  | cts. Io 10 1 | $\left\{\begin{array}{l} \text { Very fine for vases and bou- } \\ \text { quets. The plumes of } A . \\ \text { nebulosa are very delicate. } \end{array}\right.$ |
| 89040 *Andropogon arg | 3 | hP |  | 3 | 10 | Silky flowers, white hairs. |
| 89060 Arundo Donax 89070 *-fol. varieg |  |  |  | 10 | 10 | Subtropical plants of stately \} growth; ornamental habit. |
| 89090 Avena sterilis | 23 | hA |  | 3 | 5 | (Animated Oats.) Curious. |
| 89110 Briza geniculata 89120 gracilis 89130 maxima. | . ${ }^{2}$ |  |  | $1 \frac{1}{2}$ | 5 5 5 | $\}_{\text {(Quaking Grass.) No. } 89130 \text { is }}^{\text {very pretty for bouquets. }}$ |
| 89150 Brizopyrum siculum |  |  |  | $\frac{3}{4}$ | 5 | Dwarf species of Spike Grass. |
| 89170 Bromus brizæformis . . . oz., 25c. 89180 macrostachys . . . . . oz., 25c 89190 madritensis. . . . . . . . . . . . |  |  |  | 3 | 5 5 5 | $\left\{\begin{array}{l}\text { No. } 89170 \text { is very fine for winter } \\ \text { bouquets. To this genus } \\ \text { belongs the Cheat Grass. }\end{array}\right.$ |
| 89230 Chloris barbata |  |  |  | I | 10 | For groups and for baskets. |
| 89250 Chrysurus cynosuroides |  |  |  |  | 5 | Pretty for edgings. |
| 89270 Coix Lacryma.oz., 15c., lb., 5 oc. 89280 -aurea zebrina.............. | 23 |  |  | I $\frac{1}{2}$ | 5 | \} (Job's Tears.) Seed resembles a tear-drop. |
| 89300 Cryptopyrum Rich | 2 |  |  | 2 | 5 | Very fine Grass. |
| 89320 Eleusine barcinonen $89330 \quad$ coracana........ 89340 indica . . . . . . . | $\begin{array}{ll}2 & 3 \\ \cdot & \end{array}$ |  |  | I . . . | 5 | $\} \begin{aligned} & \text { (Crab, or Yard Grass.) E. } \\ & \text { indica is the Wire Grass. } \end{aligned}$ |
| 89350 Elymus giganteus | 2 | hP |  | 5 | 5 |  |
|  |  | hA |  | $\begin{array}{ll} & \text { I } \\ . & . \\ . & . \\ . & . \\ . & .\end{array}$ | 10 5 | $\left\{\begin{array}{r} \text { Pretty Grasses, growing about } \\ \text { a foot high, and characterized } \\ \text { by their beautiful, dancing } \\ \text { spikelets; fine for bouquets. } \\ \text { No. } 89360 \text { is Love Grass. } \end{array}\right.$ |
| 89420 Erianthus |  | hP |  | 6-8 | 5 | (Plume Grass.) Very stately. |
| 89440 EULALIA ja 89450 -zebrina |  |  |  | 5 | 10 | Among the most beautiful of ) the tall-growing grasses. |
| 89470 Festuca |  |  |  | 2 | 15 | Fescue Grass.) Ornamental. |
| 89490 Gymnothri |  |  |  |  | 5 | rown chiefly as curious and |
| 89500 japonica 89510 latifolia |  |  |  | $2-3$ 4 | 10 | $\int \begin{aligned} & \text { ornamental grasses; very } \\ & \text { striking. } \end{aligned}$ |
| 89530 *Gynerium argenteum. $\frac{1}{4}$ oz., 20 C . <br> 89550 *-roseum <br> 89560 jubatum |  |  |  |  | 10 | $\left\{\begin{array}{l} \text { (Pampas Grass.) This is the } \\ \text { noblest of the tall-growing } \\ \text { grasses, and bears magnifi- } \\ \text { cent plumes. } \end{array}\right.$ |
| 89580 Hordeum |  | hA |  | 2 | 5 | (Squirrel-tail Grass.) |
| 89600 Isolepis grac Job's Tears |  | tP | - . | $\frac{1}{2}$ | 25 | ery pretty rush-like grass. ee Coix Lacryma,above, 89270 |
| 89620 Lagurus ovatus . . . . . . oz., 25 C |  | hA |  | 2 | 5 | (Hare's-tail Grass.) |
| 89640 Lasiagrostis |  |  |  | 3 | 5 | , |
| 89660 Panicum sulcatum |  | hA |  |  | 10 | Very showy and hardy |
| 89680 PENNISETUM villosum....... <br> 89690 Rueppelianum. <br> ....oz., 3 oc. |  |  | m. | 1 1 3 3 | 5 | Ornamental grass. 89690 has beautiful crimson plumes. |
| 89710 Poa amabilis |  |  | apet. | 2 | 10 | retty for bouquets and edgings |
| 89730 Setaria alopecuroides nigra. |  |  |  |  | 5 | Graceful black spikes. |
| 89750 *Stipa pennata. . . . . . $\frac{1}{4}$ oz., 20 c. <br> 89760 elegantissima . . . . . . . . . . . . . | .$^{2}$ |  |  |  | 10 | (Feather Grass.) Grown for ) its very graceful plumes. |
| 89780 Tricholæna atropurpurea. |  | hA |  |  | 5 | A very pretty grass. |



## Collections of Ornamental Grasses

8994025 varieties Ornamental Grasses, one packet of each.......................................... . . . . . . 80
90000 r 2 varieties Ornamental Grasses, one packet of each.50

# CHOICE COLLECTIONS OF FLOWER SEEDS (Free by mail) 

93000

# 12 Dwarf Annuals 

50 cts.
93080
12 Dwarf Perennials

I packet each
Alsine pinifolia
Arabis alpina
Arabis alpina $\quad$ ariesi
Campanula grand. Mariesi
Candytuft gibraltarica
Candytuft gibraltarica
Daisy, Double, Mixed

Gypsophila cerastoides
Snapdrảgohi, Dwarf, Mixed

Leontopodium (Edelweiss)
Lychnis Haageana Hybrids
Pinks, Mixed
Snapdrâagoh; Dwarf, Mixed

Asters, Mixed
Candytuft, Mixed
Convolvulus, Dwarf, Mixed Eschscholtzia, Mixed
Larkspur, Dwf. Rocket, Mixed
Marigold, Dwf. French, Mixed

## Mignonette

Nasturtium, Dwarf, Mixed Phlox Drummondii, Mixed Portulaca, Single, Mixed Sweet Alyssum
Zinnia, Dwarf, Mixed

93020

## 12 Tall Annuals

I packet each

Centaurea cyanus, Mixed
Clarkia, Mixed
Collinsia, Mixed
Cosmos, Mixed
Larkspur, Tall Rocket, Mixed
Lupinus, Mixed

Marigold, African, Mixed
Malope, Mixed
Poppy, Mixed
Scabiosa, Tall, Mixed
Sunflower
Zinnia, Tall, Mixed
93040
12 Annual Climbers
I packet each

Canary-Bird Flower
Cypress Vine
Calampelis scabra
Dolichos Lablab, Mixed
Gourds, Mixed
Humulus japonicus
Imperial Japanese Morning-Glory

Maurandya, Mixed
Nasturtium, Tall, Mixed
Sweet Peas, Mixed
Thunbergia, Mixed
Vicia Gerardi

Aquilegia, Mixed Galega
Centaurea candidissima Lupinus polyphyllus
Coreopsis
Delphinium, Mixed Poppy orientale
Foxglove
Gaillardia
$93140 \quad 12$ Everlastings (1 pkt. ea.) 50 cts.
93180 I2 Varieties Greenhouse seeds . \$2 I packet each
Asparagus plumosus nanus Geranium zonale
Begonias, Single, Tuberous- Heliotropium, Fine Mixed
rooted Calceolaria hybrida, Largehybrida, Mixed
flowered, Self-colored Primula chinensis fimbriata,
Cineraria hybrida, Mixed Extra-fine Mixed
Coleus, Fine Hybrids Smilax
Cyclamen giganteum, Mixed Stevia serrata
$93200 \quad 12$ Annuals for Bees (i pkt. ea.) 50 c .

## PALM SEEDS

Imported direct from approved sources in Australia, New Zealand, South America, West Indies, etc. Fresh seeds arrive as the various species mature, the greater number coming during the spring and summer. The seeds are slow in starting, and the germinating period varies, according to the variety, from three weeks to three months. The young plants should be potted in 3 -inch pots in a compost of rotted sods, leafmold and sand, and well watered. They grow slowly. As soon as the roots begin to crowd, the plants should be lifted into larger pots, special attention being given to secure good drainage. They do well in partial shade, and to keep the soil cool and to prevent it from quickly drying out, it is well to cover the surface with sphagnum moss. They must be kept in an even temperature. Our friends are invited to let us book their orders, to be sent from time to time as fresh shipments arrive.

| seeds |  |  |  | Geonoma gracilis . . . . . . . . . I5 seeds; \$o Kentia Belmoreana.......... . 15 =" |  | Pkt. |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Areca lutescens. | eeds, \$0 | 25 | \$1. 25 |  |  | $\begin{aligned} & 25 \\ & 25 \end{aligned}$ | \$1 50 |  |
| sapida..... . . . . . . . . . . . ı |  | 10 |  |  |  |  | 25 |
| Brahea filifera (Washing- |  |  |  | Canterburyana (Umbrella |  |  |  |  |  |
| tonia).... . . . . . . . . . . 30 | " | 10 | 25 | Palm). |  | 50 |  |  |
| robusta...... . . . . . . . . . . 25 |  | 10 | 30 | Forsteriana. . . . . . . . . . . . 15 |  | 25 |  | 50 |
| Chamærops elegans argentea ${ }_{5}$ | ، | 10 | 50 | Latania borbonica.......... 25 |  | 10 |  | 30 |
| excelsa.......... . . . . . . 30 |  | 10 | 25 | Musa ensete (Abyssinian |  |  |  |  |
| Cocos australis. . . . . . . . . . . 15 |  | 20 | 100 | Banana).............. ${ }^{\text {I } 5}$ |  | 25 |  | 50 |
| Bonnetti....... . . . . . . . . 15 | " | 25 | I 25 | Oreodoxa regia (Royal |  |  |  |  |
| campestris.............. . ${ }_{5}$ |  | 20 | 100 | Palm) ....ram. . . . . . ${ }^{\text {I } 5}$ |  | 20 |  | $\bigcirc 0$ |
| Weddelliana.............. ${ }^{5}$ |  | 25 | I 50 | Pandanus utilis (Screw Pine) 8 |  | 15 | 1 | 50 |
| Corypha (Livistona) australis |  |  |  | Phœnix canariensis......... 15 |  | 10 |  | 40 |
| (Cabbage Palm)...... . 10 | " | 10 | 75 | dactylifera (Date Palm). . 15 | " | 10 |  | 50 |
| Dracæna australis........ . . 20 | " | 15 | 50 | reclinata................. . 8 | " | 10 |  | 80 |
| indivisa........ . . . . . . . . 25 | " | 10 | 25 | rupicola . . . . . . . . . . . . . . 15 | " | 25 | 1 | 25 |
| indivisa lineata..... . . . . 15 | " | 10 | 50 | tenuis.... . . . . . . . . . . . . 15 | " | 10 |  | 40 |
| Draco.... . . . . . . . . . . . . 30 | " | 25 | 50 | Seaforthia elegans......... . 8 | " | 10 |  | 75 |
| Throughout the year we have Cycas revoluta stems (Sago Palms) in various sizes direct from Japan. Lb. I5 cts. |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |

## GLADIOLI

Gladioli are very easily grown. Any good soil suits them. Plant as soon as all danger from frost is past, about 3 inches deep and 7 or 8 inches apart. By planting at intervals up to the first of July, these fine flowers can be had in bloom all through the summer and fall-the later flowers being the best. About the end of October, when the leaves begin to wither, the bulbs should be taken up, dried in the open air, and then stored in a dry place, free from frost, for planting next spring. Those marked with an asterisk (*) are used extensively for forcing.

## NEW YELLOW GLADIOLI

PRIMULINUS. Scarce. Rare species from Victoria Falls, South Africa; grows 3 or 4 feet tall and is very vigorous. The flowers are of good size and are a clear primrose-yellow. Blooms late in July. 35 cts. each, $\$ 3.50$ per doz., $\$ 22$ per 100.
PRIMULINUS Hybrids. Hybrids of the above, with many related species and choice garden varieties. Extremely vigorous and healthy growers, blooming in July and August. Grows 3 to 5 feet high, with long spikes of richly colored blooms, varying in color from clear yellow to crimson, the latter with large, soft orange or golden throats. 20 cts. each, \$I.50 per doz., \$io per ioo.

## THORBURN'S EXTRA-FINE MIXED HYBRIDS

Containing only finest named sorts in a wide range of colors and markings. 65 cts. per doz., $\$ 4.50$ per 100, $\$ 40$ per I,000.

## VARIOUS MIXED GLADIOLI



GLADIOLUS PRIMULINUS

6 of a kind at dozen rates, 25 at 100 rates, 250 at 1,000 rates
Mixed Varieties of Red Doz. 100 I,000 and Scarlet.
Extra fine.... \$0 30 \$2 00 \$I6 00
" White and Light.
Standard selec-
tion............ 352251800
" White and Light.
Extra fine for
florists' use..... $50 \quad 350 \quad 2800$
" Striped and Variegated........... 453002500
" Pink and Rose.
Extra fine ...... $35 \quad 2 \quad 25$ i8 00
" Yellow and Orange. $65450 \quad 3800$
" Hybrids. All colors. 30 I 75 I4 00
" Groff's Hybrid
Seedlings...... $30 \quad 200 \quad 1600$
" Lemoine's. Fine, bright colorings and odd markings $30 \quad 200 \quad 1600$
" Childsii. Superb, large flowered ... $40 \quad 250 \quad 2000$

## FINE NAMED HYBRID GLADIOLI (Gandavensis)

6 of a kind at dozen rates
Amalthee. Pure white, large Each Doz violet-red blotch; ground of the corolla velvety violet, lower petals slightly tinged lilac .... Wh................ \$o
Angele. White; showy and effective....................... 12 I 25
*Augusta. Beautiful pure white, with blue anthers per 100, $\$ 4$. . $06 \quad 60$
Baron Hulot. Also called Blue Jay Blue..................... I
Brenchleyensis. Bright vermil-ion-scarlet .... per 100, $\$ 2.50 \ldots 0540$
Carnation. Flesh-white, tinged carmine at the edges, the lower petals blotched purplish carmine.

I 25
*Ceres. Pure white, spotted with
purplish rose. . per 100, $\$ 3.50$. . 06
60

## FINE NAMED HYBRID GLADIOLI (GANDAVENSIS), continued

Chicago. Compact spike. Dark car- Each Doz. mine-red, with almost black stripes, large white blotch and center band.\$0 12 \$I 25
Conquete. Bright cherry-red, with pure white blotch; upper petals striped rose; large flowers.

12
I 25
Crepuscule. Splendid spike; flowers lilac-rose, flushed carmine, with violet on the edges of the petals. . . . . . .
Demosthene. Bright rose, flamed carmine, streaked white, bright center, blotched violet-carmine; dwarf habit. 12
DIAMANT. Extra-large flowers, fleshwhite, with ivory-white throats, blotched and streaked carmine......
Emma Thursby. Carmine, striped on white ground............ per Ioo, $\$ 4$. . 06

I 75

Escarboucle. Dark carmine-red, pure white band and blood-red blotch.... 12
*Eugene Scribe. Fine tender rose, blazed carmine; very large and wide flowers.
Feu Follet. Well-opened flowers with ivory-white throats, richly tinted and striped with carmine at the edges...
Fra Diavolo. Bright orange-rose, flushed violet-red at edges; pale yellow blotch.
Grandesse. Large, well-opened flower; petals flesh-white, slightly suffused with lilac. Carmine blotch.
*Isaac Buchanan. Very fine yellow..... 10
*Lamarck (de). Large flowers, cherrytinted orange, blazed red, stained white.
Madame Monneret. Delicate rose. . . per 100, $\$ 4.50$. 10
Matador. Fine spike, flowers brilliant carmine, striped and blotched white.. 20
Madame Poiret. Large spikes of coppery rose-colored flowers, with slight golden blotch. 12

I 25
Magnificus. Very large flowers, round and open; cinnabar-red with white blotch, edged violet. 20
*May. Fine pure white, flaked rosy Each Doz. crimson; superb spike. One of the best for forcing. . . . . per Ioo, \$4. . \$o 06 \$o 60
Mr. A. Brongniart. Rose ground, slightly tinged with orange and flamed with red; large white blotch. I2
Mr. Jansen. Large; rosy carmine, edged and streaked violet-red, with cream-colored blotch

12125
MRS. FRANCIS KING. Light scarlet;
lovely................................. 80
Neron. Tall spike; dark crimson, suffused with dark blood-red and violet.


Octoroon. Beautiful salmon-pink..... IO
Pactole. Yellow, tinged with rose at the edges; blotch of a darker shade..... I2
POTENTAT. Carmine-rose, blotched scarlet, edged yellow.

20 I 75
PRINCEPS. Glowing crimson, with white flakes on lower petals. Flowers are remarkable for size and brilliancy.
Proserpine. Large, cherry-red flowers, banded with slate-color; tall spike...
Rossini. Dark amaranth-red, streaked and blotched white.
SCEPTRE DE FLORE. Large flowers of the richest rose-color, with white throat, spotted carmine; lower petals blotched carmine, with white band..20 I 75

*Shakespeare. White, slightly suffused

12 carmine-rose; large rosy blotch.

I 25

| Suffren. Bright cherry-rose, blotched |  |  |
| :--- | :--- | :--- |
| carmine and with violet center stripe. | 12 | 1 |

Surprise. Rose-amaranth; very lateblooming variety.

IO 75

Thermidor. Large, salmon-red flowers,
flushed and edged slaty gray........ 12

I 25

Tigridia. Flowers salmon-yellow, flamed with rosy carmine.

12
I 25
Titania. Beautiful, tall spike; flowers creamy salmon, flamed cherry...... I2
Van Dael. Large flowers of a delicate salmon-rose at the center, streaked with blood-red at the top of the petals.

## FINE NAMED HYBRID GLADIOLI (LEMOINEI)

LAFAYETTE. A large, very fine Each
flower, crimson-red blotch on a. Doz.

Precurseur. Bright rosy lilac with a brilliant carmine-red blotch on a white ground. Very early.

I 50
Professor Le Monnier. Large flowers, sharp petals; orange-scarlet; dark blotches edged golden yellow......... 15

## GIANT CHILDSII GLADIOLI

Very tall and erect, often 4 or 5 feet high, with spikes of bloom over 2 feet long. The flowers are of great substance and of gigantic size, frequently 7 to 9 inches across. Every color known among Gladioli.
*AMERICA. Soft flesh-pink, tinged Each Doz: lavender; erect spike. Strikingly beautiful......................... $\$ 0$ по
Attraction. Deep, rich crimson, pure white throat.
Deborah. Dark red, pure white throat. Io
Dr. Sellew. Large spike; deep, rich, rosy crimson, penciled darker.

10
F. L. Oakley. Bright salmon, tinged scarlet, with pure white center. Very showy.

10
Henry Gillman. Deep salmon-scarlet, with pure white bands through each petal; throat peculiarly mottled
\$I 00
I 00
I 00
I. 00

I 00

Irene. Pink, freely flaked bright Each Doz. crimson........................... . $\$ 0$ 10 \$1 00
Little Blush. Dwarf habit; compact spike of blush-white flowers......... Io

10
o 75
Oddity. Amaranth-red, throat mottled red and white......................... . . 10 75
Rosy Spray. White, sprayed rose..... 12 I 25
Salem. Fine salmon-pink, maroon

Sunlight. Light crimson, canary-yellow throat................................ . . 10 75

Superb. Pink, flaked and striped; enormous flower; immense spike........ IO

IO
I 00
Wm. Falconer. Enormous size; beauti-
ful clear light pink.
12
I 25

## DAHLIAS (Double)

6 of a kind at dozen rates


| CACTUS DAHLIAS, continu |  | Doz. |
| :---: | :---: | :---: |
| Ruby. Bright ruby-red. Fine. |  | \$200 |
| ST. CATHERINE. Deep yellow shaded red. | 15 | 50 |
| UNCLE TOM. Jet-black, passing to maroon, with a satiny sheen. | 15 | I 50 |
| White Swan. Beautiful pure white.. | 20 |  |

## DECORATIVE

ADMIRAL DEWEY. Brilliant purple; Each Doz. fine form; strong grower. . . . . . . . . . . \$O I5 \$I 50
Black Prince. Shaded deep maroon, almost black......... . . . . . . . . . . . . .
Blue Oban. Lavender-blue; long stems is I 50
Catherine Duer. Crimson-scarlet; long, stiff stems. Very fine.

I5 I 50
C. W. BRUTON. Very large; clear canary-yellow; profuse bloomer; long stems.
Cyclops. Rich crimson, flushed lighter; long, straight, stiff stems...........
Eureka. Deep rose blooms of good size. Valuable for cutting.
JACQUE ROSE. Crimson, a shade darker and richer than the celebrated General Jacqueminot rose. Planted May I, comes into bloom early in June and continues flowering until cut down by frost in October. Flowers are full to center and are borne on long stems. Fine for cutting. See illustration, page 137..
Jumbo. Deep crimson flowers, shaded maroon, on stout stems; elegant form.
Brunhilde. Dark, rich plum-color; Each Doz. fine flower........................... $\$ 0$ I5 \$I 50
CAPSTAN. Soft brick-red, shaded apricot; profuse bloomer.
Cinderella. Dark purple-maroon; petals long and pointed. Early and free.
EARL OF PEMBROKE. Bright plum, deeper toward center.
Elsa. White, suffused and edged pink. fine shape
Eva. Beautiful dwarf white. Profuse bloomer; fine for cutting.
Gabriel. Soft velvety crimson petals, tipped pure white; petals incurved..
Genesta. Amber, shading to golden yellow at center; long, stiff stems....
Gloriosa. Splendid crimson; true Cactus form.
J. H. Jackson. Very large; rich, velvety maroon. .
J. W. Wilkinson. Deep reddish plumcolor; petals very long and narrow. .
Kriemhilde. Deep rosy pink, lighter toward center. Distinct; fine for cutting. See illustration
MRS. CHAS. TURNER. Bright lemon-yellow; long, pointed petals; perfect form. Exquisite. See illustration.
Mrs. J. P. Clark. Long, incurving petals, with various combinations of color, from soft reddish apricot to pink and white
Mrs. George Stevenson. Very large; clear canary-yellow. The best yellow Cactus.


CACTUS DAHILIA, KRIEMHILDE

## DECORATIVE DAHLIAS, continued

LORD LYNDHURST. Intense ver- Each milion-scarlet; fine grower; very prolific; long stems...................\$0 15 \$1 50
MAID OF KENT. Rich cherry-red, tipped white; fine flower............ 15 I 50
Nymphæa. White, suffused light shrimp-pink. One of the most delicately beautiful sorts.
15 I 50

ORANGE KING. Rich, glowing orange; very early; profuse bloomer.
Prof. Mansfield. Rich yellow, with clear white tips and a slight marking of rosy red toward the center; immense flower.
Souvenir de Gustave Douzon. Attractive orange-red flowers of immense size
SYLVIA. Deep pink tinting to fleshpink at center; large, perfectly formed flowers on long, stiff stems. One of the best for cutting. ........
Xanthia. Dark purple, with crimson, reflexed center; very fine.

15 I 50
15 I 50
ZULU (The Black Dahlia). Very dark maroon, almost black. Great favorite.
15 I 50

## SHOW AND FANCY

A. D. LIVONI. Soft pink; quilled Each Doz. petals; profuse bloomer. One of the best of all Show Dahlias........... \$0 15 \$I 50
ARABELLA. Pale primrose, tipped and shaded old-rose; profuse bloomer; large flowers of perfect form.....
ENCHANTRESS. Pure white; fine form; free bloomer. Fine for cutting.

15 I 50


DECORATIVE DAHLIA, JACQUE ROSE (see p. I36)


SHOW DAHLIA, GRAND DUKE ALEXIS

## SHOW AND FANCY DAHLIAS, continued

Camellia Flora. Pure white flow- Each Doz. ers of great substance. Dwarf grower............................ $\$ 0$ 15 $\$ 150$
GRAND DUKE ALEXIS. Pure white, slightly shaded delicate lavender. See illustration..................... 15 I 50
JOHN WALKER. Pure white; round, full form..........................
La Favorite. Beautiful white, tinted
green at base of petals; very long, stiff stems.

I5 I 50
Lemon Ball. Canary-yellow, tinted lemon. Full round flowers of medium size...........................
Mrs. Dexter. Beautiful rich salmon; very attractive....................
Penelope. Pure white, flaked soft lavender.
Queen Victa Rich
Vicria. Rich golden yellow.
I5 I 50

Red Hussar. Rich cardinal-red; strong, vigorous grower and free bloomer. Fine for cutting.........
Striped Banner. Crimson-scarlet, tipped white; semi-dwarf. Very effective and unique.

15 I 50
SUNSET. Golden yellow, shaded deeper; large, full, perfect flowers, on long stems well above the foliage..

## POMPON

Aillett's Imperial. White, suffused Each Doz. pink, tipped imperial purple ....... \$o 15 \$1 50
COHANT. Rose and white........... I5 I 50
Guiding Star. White; notched petals. 15 I 50
Little Bessie. Cream-white; quilled petals.

I5 I 50
MARGUERITE. Deep rose. Fine... I5 I 50
ROSEBUD. Rose, lilac and white.... I5 I 50

## NEW CENTURY DAHLIAS, SINGLE

This new race of Single Dahlias was originated in the form of 20th Century varieties a few years ago, but the sorts here offered entirely outclass the original


CENTURY DAHLIA, GLADYS or 20th Century type. These newer varieties produce flowers of immense size, with exquisite blendings of shades and tints, borne on long stems, making them immensely valuable for cutting.
Cardinal Century. Very large; bright, Each Doz. rich cardinal-red; perfect color..... \$o 25 \$2 50
FRINGED 20TH CENTURY. A great improvement on the wellknown 20th Century, but much larger. Color light rosy crimson, with lighter markings.. .
GLADYS CENTURY. Distinct and beautiful. Center of petals rosy crimson, with rose-pink band on either side and white zone around the yellow center. See illustration..
MAROON CENTURY. Deep maroon, shading to black; rich and effective.. Penciled Century. Rose-pink, shaded cerise, penciled crimson. Distinct.. .
ROSE-PINK CENTURY. Largest and best deep pink; enormous flowers on long stems ( 3 ft ). Vigorous and continuous bloomer.

## CANNAS, Dwarf Large-Flowering French

## Not less than 6 of a kind at dozen rate, 25 at the 100 rate

Cannas do well in almost any kind of soil, but they well repay liberal treatment. For the best results they should be planted in good loam that has been well mixed with an abundant supply of well-rotted stable or other manure. The beds should be spaded 2 feet deep, or more, and the soil well pulverized. Water should be applied abundantly at all times, but good drainage is essential.

Cannas are most effective when planted in masses, either alone or in combination with salvia (scarlet sage) and bordered with coleus or other dwarf-growing bedding plants. They are also frequently used with some of the tall-growing ornamental grasses, with which striking combinations can often be secured. They do best in sunny situations, and should be set out about 2 feet apart each way.

## ALL OF THE FOLLOWING ARE DORMANT ROOTS

## GREEN-FOLIAGE VARIETIES PINK-FLOWERING

MARTHA WASHINGTON. 3 Each Doz. 100
feet. Extra-large, bright rose-
pink flowers, often measuring
over 5 inches across. Vigorous bloomer...
$\begin{array}{llllll}\$ 0 & 12 & \$ 1 & 20 & \$ 8 & 00\end{array}$
VENUS. 4 feet. Splendid rosy pink flowers, with a mottled border of creamy yellow. Blooms splendidly, with heads erect and flowers bright, shedding the old ones as fast as the new ones appear.
$\begin{array}{lllll}\text { I2 } 2 & \text { I } & 20 & 8 & 00\end{array}$

## RED-FLOWERING

Duke of Marlboro. 4 feet. Dark, Each Doz. Ioo rich velvety crimson; fine, shapely flowers in large, wellfilled trusses................
PILLAR OF FIRE. 6 to 7 feet.
The giant of its class; bright, crimson-scarlet flowers, borne in erect spikes. Continuous bloomer; striking.
President McKinley. $21 / 2$ feet. Deep, rich crimson flowers; beautifully formed. Compact grower.
\$0 12 \$1 oo \$7 00

## YELLOW-FLOWERING

BUTTERCUP. 3 feet. Finest Each Doz. 100 pure, deep canary-yellow
Canna in existence. Beau-
tiful. $\qquad$ . . . . . . . . . . . . . . . . \$o
GLADIATOR. 5 feet. Yellow flowers, spotted red. Strong and vigorous grower; its large flower-heads stand storms and hot sunshine better than any other variety. Continuous bloomer

$$
\text { I5 I } 40
$$

900

## VARIEGATED FLOWERS

NIAGARA. 3 feet. Rich, deep Each Doz. 100 crimson flowers, with wide, irregular border of deep golden yellow...................... . \$o I5 \$I 40 \$9 oo

One each of the above 8 sorts for 85 cts .

## BRONZE-FOLIAGE VARIETIES PINK-FLOWERING

EASTERN BEAUTY. 4 feet. Each Doz roo
Fine shade of salmon and orange, changing, after a few days, to an attractive fleshpink. \$0 12 \$1 $20 \quad \$ 800$

RED-FLOWERING BRONZE-FOL. CANNAS<br>Brandywine. $3^{1 ⁄ 2}$ feet. Magnifi- Each Doz. 1о0 cent, brilliant red flowers, with very dark foliage............. \$o 12 \$1 $20 \$ 8$ oo<br>Egandale. 4 feet. Pretty cherryred flowers, borne well above the foliage................. 12 I oo 7 oo<br>Mount Etna. 4 feet. Brilliant crimson flowers; large erect trusses; dark purple foliage... 12 I 2080<br>One each of the Pink- and Red-flowering Bronzefoliage Cannas ( 4 sorts) for 40 cts .

## ORCHID-FLOWERING VARIETIES

Indiana. 6 feet. Golden orange, Each Doz. ioo prettily marked and striped.
Blossoms often 7 inches across. $\$ 0$ in $\$ 120 \$ 8$ oo
KING HUMBERT. 4 feet.
Bears immense, brilliant
orange-scarlet flowers, streaked with crimson, in
gigantic trusses. Foliage rich Each Doz. 100 coppery bronze. A massive, sturdy grower, of stately habit...................... \$0 15 \$1 50 \$10 oo
NEW YORK. Foliage alone reaches 4 or 5 feet high; the leaves are large and broad and stand quite erect, thus showing their deep, rich, purple-plumcolor on both sides. Has five or six flower-stalks at once on every well-fed plant, borne well above the foliage. The flowers measure 5 to 7 inches in diameter, have five petals, and are of a beautiful crimsonscarlet. .

15 I 50 10 00
WYOMING. 7 feet. Immense umbels of massive orange flowers; bronze-purple foliage. A splendid bedder.

15 I $25 \quad 8$ oo
One each of the above 4 sorts for 45 cts .

## all the above are dormant roots <br> PAEONIES

## If wanted by mail, add 5 cts. each, for postage

Double Pæonies are too well known to require description. Their present popularity is due to the great improvement in them in recent years, their easy culture, the handsome appearance of the plant, and the brilliant and striking effect of their massive, finely formed and richly colored flowers. The attention given to them, in Europe and in America, has resulted in the production of many notably fine new varieties. Among hardy, herbaceous perennials, the Chinese Pæonies rank about first for lawn or flowerborder, or shrubbery decoration. They are all hardy.

Our assortment includes some of the best and most distinct sorts, new and old. There are many kinds, including varieties showing but trifling variations, which we omit.
HERBACEOUS CHINESE
PAEONIES (Paonia Chinensis)
PA

$$
\begin{aligned}
& \text { Double Mixed, All White............. } \begin{array}{l}
\text { Each } \\
20
\end{array} \underset{\$ 2}{\text { Doz. }} \\
& \text { "، "، All Crimson.......... } 20 \text { 200 } \\
& \text { " " All Rose.............. } 20 \quad 2 \text { oo } \\
& \text { " " All Pink............... } 20 \quad 200 \\
& \text { ". " All Carmine........... } 20 \quad 200
\end{aligned}
$$

## JAPANESE TREE PAEONIES <br> (Paonia arborea)

These are very beautiful and free-flowering, and bloom two or three weeks earlier than the herbaceous sorts. We are importing an assortment of the following fine named varieties. $\$ \mathrm{I} .50$ each.
Berenice. Rosy lilac; enormous flower.
Blanche de Chateau Futu. Pure white.
Comtesse de Tuder. Tender rosy white; very double, fine-shaped flower.
Elisabeth. Brilliant pink; one of the largest flowers.
Guillaume Tell. Bright carmine, with white border; large flower.
Madame Stuart Low. Reddish salmon, white center, large flower.

## PAEONIA OFFICINALIS

Anemonæflora. Crimson; single anem- Each Doz. one flower shape.................... \$o 40 \$4 oo
Mutabilis plena. Tender rose, passing to white; double.................... 30 . 300
Rosea plena. Pink.................... 35 35
Splendens. Dark red; half-double
flower.................................... 40 00
Tenuifolia, Single-flowering. Rich crimson; narrow, feathery foliage.... $20 \quad 200$

HARRISON'S PEONY MANUAL. Paper cover; 64 pages, illustrated. 25 cts. per copy, postpaid.


PLANTING OF JAPAN IRIS

## JAPAN IRIS (Iris Kampferi) <br> SUPERB COLLECTION OF LARGE-FLOWERED SORTS

We are importing from Japan a large supply of the following twenty of the best of these magnificent Irises, which are remarkable for the beauty of their colorings and for their stateliness of habit. Some of them send up ten or twelve flower-spikes 3 feet high, each bearing two to four enormous blossoms, measuring 8 to io inches across. They are most valuable for cut-flowers and table decoration-as handsome as orchids. They require a liberal supply of water when growing. Flowers should be cut in the early morning or after sunset. They come in large clumps. The descriptions given are those furnished us by the growers in Japan.

Biwa-no-umi. White, feathered purple; sky-blue at edges; primrose blotches; large flower. 3 petals.
Boteki-no-Koe. Pure white, heavily veined lavender, with pale primrose blotches; standards winecolor, lighter toward edges, stigmas lavender; striking. 3 large petals.

Date-dogu. Rich claret-red, yellow blotches. 3 petals.
En-u-no-Sora. Rosy lavender petals, light purple toward the center, large primrose blotches; standards white, veined and edged claret-red. 3 petals. Large and distinct.

## JAPAN IRIS, continued

Gekka-no-nami (Waves under Moonlight). Dense, pure white, with yeilow blotches; petaloid stigmas creamy. 6 petals.
Hakubotan. Large; pure white, with light primrose blotches; full flower.
Ho-o-jo (Ho-o-castle). Ruby-crimson, primrose blotches; standards white and lavender.
Kagura-Jishi. Blush-white, radiating to bright claret-red on outer edge of petals; light yellow blotches.
Osho-kun. Intense Tyrian-blue, with yellow blotches radiating to white; petaloid stigmas dark violet. 6 petals.
Ran. Royal-purple, edged lavender, with large primrose blotches; standards wine-red, white at bases. 6 petals. Large and distinct.
Sassa-no-Koe. White, veined wine-red and blotched yellow; standards lavender, running to purple at edges. 3 petals.
Shi-un. Rich purple, with large primrose blotches; large, full flower. 6 petals.

Shippo (Cloisonne). Rich Tyrian-blue, edged purple and veined white; yellow blotches; standards white and wine-color. Large flowers.
Shiraito-no-Taki. Sky-blue, radiating to light purple at edges; large, yellow blotches; standards white, pale blue and purple; distinct. 3 petals.
Sui-Ren. Very pale lavender, darker at edges, with yellow blotches. 6 petals.
Taki-no-shiose. Large flower; pure white, with primrose blotches. 6 petals.
Tatsuta-Gawa. Blush-white, radiating to claret-red at edges; primrose blotches. 3 petals.
Yamato-Nishiki. Pale lavender, running to purple on outside of petals; blotched and flaked dark purple; large primrose blotches; immense flower. 3 petals.
Yedo-Jiman. Royal-blue; large petals; standards purple. 3 petals.
Yodokuruma. Pale wine-color, veined darker; large orange blotches; standards very erect. Gigantic blooms. 3 petals.

HARRISON'S IRIS MANUAL. Paper cover; 30 pages. Full cultural directions and other valuable information. 25 cts. per copy, postpaid.

## AMARYLLIS

The Amaryllis produces, under the simplest conditions, one to three spikes, two or more feet high, crowned with from two to six large and beautiful, trumpet-shaped blooms lasting long in good condition. They should be planted as soon as received, in pots an inch or so larger than the diameter of the bulb.

The most suitable soil is good loam, with one-fourth part of leaf-mould or pulverized manure, and some sand. Good drainage is very important. The growing season is from early spring until September. Manurewater during this time is almost essential.

Belladonna major. Violet and white; Each Doz. in large umbels; fragrant........... \$0 25 \$2 25 Formosissima (Jacobean Lily). Pretty scarlet flowers. May be planted outside in the spring.
$15 \quad 1 \quad 25$
Lutea (Sternbergia). Bright yellow... I2 I 25

Johnsoni (Spice Lily). Large flower; Each Doz. crimson, striped white. Large bulbs . \$o $60 \$ 6$ oo Hippeastrum, Empress of India Seedlings................................ $70 \quad 7$ oo
Hippeastrum, Mixed Hybrids......... 606 oo
Vallota purpurea (Scarborough Lily).... $35 \quad 35^{5}$

## BEGONIAS, TUBEROUS-ROOTED

## 6 of a kind at dozen rate, 50 of a kind at 100 rate

Splendid pot-plants for the house or for bedding. For bedding they should be started in hotbed in March and April. The hollow end of the bulb should be uppermost and but slightly covered. Water sparingly until the plants are growing.

|  |  | Each | Doz. | 100 |  |  | Each | Doz. | 100 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Single | Scarlet. | \$0 07 | \$0 65 | \$400 | Double | White.. | \$0 10 | \$1 00 | \$6 oo |
|  | Rose | 07 | 65 | 400 |  | Yellow. | 10 | I 00 | 6 00 |
|  | White | 07 | 65 | 400 | " | Rose | IO | I 00 | 600 |
| " | Yellow | 07 | 65 | 400 | , | Crimson. | Io | I 00 | 6 оо |

## BEGONIA CRISPA (Single Fringed Begonias)

These comparatively new Begonias have beautifully shaped, gracefully frilled and crested flowers, borne above the foliage on long and erect stems. An exceedingly fine strain. RED, ROSE, WHITE, YELLOW, SALMON and ORANGE. I2 cts. each, \$1.25 per doz.

## CRINUMS

The most suitable soil is a compost of turfy loam, cow-manure and sand. They should be grown in large pots or tubs, about three-fourths of the bulb being out of the soil. In late fall, remove to a coolhouse and allow to rest till new leaves begin to appear in February. If placed outside when warm weather begins, they will flower through the summer, making splendid lawn or veranda plants.

Giganteum, Giant White. Immense bulbs, large white flowers; blooms all summer; very fragrant; should be watered plentifully while Each growing
Amabile, Giant Pink. Extra large, bright pink, with white stripe; splendid flower; enormous bulb. This and the Giant White are unsurpassed for growing in tubs, blooming profusely outside all summer.

200

Kirki. Large umbels of beautiful, pure white Each flowers, with purple stripe in center of each petal; very fine.
$\$ 075$
Powelli. Produces long stems, bearing at the top five to eight large, dark rose, bell-shaped flowers, 3 to 4 inches long, of great beauty in form and color
Powelli album. Pure white; a very beautiful sort.

## LILIES

Lilies are easily grown and require little care. They do best in a light, well-drained soil. Some peat or leaf-mould may be used to advantage. They also prefer partial shade, and the taller sorts must have protection from high winds. L. auratum cannot bear manure, but thrives in ordinary light soil.

Auratum (Golden-banded Lily). The grandest of all hardy Lilies; flowers white, spotted maroon, with a bright yellow band through each petal.

8 to 9 inches..... per 100, \$9..\$0 I5 \$1 50
9 to II inches..... per 100, \$15.. 25250
II to I3 inches......per 100, $\$ 22$. . $35 \quad 325$
Auratum pictum. Beautifully spotted dark crimson. 8 to io inches.
Auratum rubro vittatum. Enormous flowers, sometimes 10 inches across; white, beautifully spotted and with a deep crimson stripe through each petal; very fragrant. 8 to 9 inches. .
Batemanni. Bright apricot.
Bloomerianum. Orange, spotted dark maroon, with crimson circle around each spot.
Bolanderi. Bell-shaped, deep crimson flowers, dotted with purple. I to 3 feet high. Rare. .
Brownii. Flowers of immense size, creamy white inside, shaded choco-late-purple outside. A splendid potplant.
Canadense. Native "Meadow Lily." Graceful, drooping, bright yellow flowers, spotted red. $11 / 2$ to 3 feet. .
Canadense rubrum. Red flowers
Colchicum (Monadelphum). Citron, black spots; 2 feet
....................
Columbianum (Oregon Lily). Orange flowers, dotted maroon; fragrant....
GIGANTEUM. A magnificent species, growing 6 to 10 feet high; white, with purple throat; extra-large, choice bulbs.


LIIIUM AURATUM
HENRYI (Orange-Yellow Speciosum). Each Doz. Tall-growing sort; deep orange-yellow
flowers; very beautiful and striking... \$0 70 \$7 00
Kelloggii. 3 to 4 feet high, with a slender stem and from three to fifteen flowers with pink revolute petals; very fragrant. Rare.
$50 \quad 5$ оо
Krameri. White, slightly tinged with red; sweet-scented.................. . . .
Leichtlinii. Orange-red, with crimson spots. 2 to 3 feet...................... .
LONGIFLORUM. Beautiful for garden culture.
6 to 8 inches.... per 100, $\$ 4.50 \ldots 0770$
7 to 9 inches.......per 100, $\$ 7 .$. Io 1 oo
8 to 10 inches...... per 100, \$10.. I5 I 50
Longiflorum multiflorum.
6 to 8 inches...... per 100, $\$ 5$. . 08 75
7 to 9 inches ......per 1oo, $\$ 7 \ldots$.. Io 100
8 to io inches ..... per 100, $\$$ Io.. I5 I 50
Longiflorum multiflorum giganteum. 6 to 8 inches...... per IOO, $\$ 6$. Io 85 7 to 9 inches...... per 1oo, \$9.. I5 I 40
9 to Io inches...... per 100, \$14. . 20200
Maritimum. Dark red, funnel-shaped flowers; beautiful. . . . . . . . . . . . . . . . . .
Martagon. Purple; 2 to 3 feet. ....... .
Parryi. Large, pale yellow flowers; very rare.
$50 \quad 500$
20.200
$75 \quad 750$
Parvum. Orange-yellow, spotted purple; 2 feet high.
$55 \quad 50$
Philadelphicum. Bright orange-red, with black spots. 2 feet.
15 I 50

Speciosum album Krætzeri. Beautiful, pure white flowers of large size; one of the handsomest and most easily grown Lilies we have. 2 to 4 feet high.

$$
\begin{array}{llll}
8 \text { to } 9 \text { inches.......per 100, } \$ 13 \ldots & 20 & 180 \\
9 \text { to II inches...... per 1oo, } \$ 19 .: & 30 & 300
\end{array}
$$

Speciosum rubrum Melpomene. Dark crimson-spotted flowers of large size. 8 to 9 inches. . . per 100, $\$ 7.50$. 9 to II inches... per 100, \$13. II to 13 inches..................... orange-red, thickly spotted; 4 feet...
$\begin{array}{lll}12 & 1 & 25\end{array}$
20 I 80
30300

Tenuifolium (Siberian Coral Lily). Nodding, rich scarlet flowers. $11 / 2$ feet tall.
Thompsonianum. Rose.
15 I 50
Thunbergianum, Prince of Orange. Orange-yellow; I foot

300

Thunbergianum, Mixed
$30 \quad 300$
Tigrinum (Tiger Lily). Orange-salmon, spotted black....... per ioo, $\$ 3.50$.
Tigrinum splendens. Beautiful rich scarlet, with black spots; finest of all Tiger Lilies. . . . . . . . . . per 100, \$5 .
Tigrinum flore pleno (Double Tiger Lily). Bright orange-red, with black spots. 4 to 5 feet....... per 100, $\$ 5$.
Washingtonianum. A lovely native variety of very stately habit. Large, trumpet-shaped flowers, pure white, tinged purple or lilac. Very fragrant. 4 to 7 feet o8

## MONTBRETIAS (Ready in April)

Hardy, summer-flowering, bulbous plants that are becoming more popular every year. They should be planted in groups and left undisturbed. Ordinary garden soil and a sunny position suit them.


Elegans. Bright yellow outside, Each Doz. 100 streaked with vermilion; fine. . \$0 05 \$0 $40 \$ 2$ oo
Golden Sheaf. Bright yellow... 0540200
Pottsii. Orange and scarlet; very
free-flowering............... 05 . 40200
Rosea. Bright salmon-rose; distinct........................ 05 40200
Soleil Couchant (Sunset). Golden yellow.
$05 \quad 40 \quad 200$
Sunbeam (Rayon d'Or). Rich yellow, spotted brown; large flowers........................ 0540200

## TIGRIDIAS (Ready in April)

These very handsome summer-flowering bulbs should be planted in the spring. They will flower profusely all summer. The plants grow about 2 feet high, with large and finely colored flowers.



## MISCELLANEOUS BULBS AND ROOTS

ALSTREEMERIA aurea (aurantiaca.) Orange-yellow. spot- Each Doz. 100

|  | 20 | $\$ \mathrm{I}$ | 25 |
| :--- | :--- | :--- | :--- |
| 05 | 40 | 2 | 50 |
| 05 | 40 | 2 | 50 |
| 05 | 40 | 2 | 50 |
| 06 | 60 | 3 | 50 |
| 05 | 35 | 2 | 00 |
| 06 | 60 | 3 | 50 |
| 05 | 40 | 2 | 50 |
|  | 20 | 1 | 25 |
|  |  |  |  |
| 05 | 40 | 2 | 50 |
|  |  |  |  |
| 05 | 35 | 2 | 00 |
| 05 | 35 | 2 | 00 |
| 05 | 50 | 3 | 00 |
|  | 30 | 1 | 50 |
|  | 20 | 1 | 25 |

I 25
ted black
brasiliensis. Deepred with black spots................ . . 07 60
AMORPHOPHALLUS Rivieri. A species of Arum with ornamental leaves; flowers without soil or water I 00 10 00
ANEMONE, Caen Mixed 2 for 5 cts.
Blue, Incomparable. Double..

ANOMATHECA cruenta. Crimson flowers; dwarf habit; fine for window garden..... 2 for 5 cts..
ANTHERICUM liliago
liliastrum major
75
ramosum
07
ANTHOLYZA, Mixed. Like Gladioli. Take up in fall. . .
" Double Mixed........
Scarlet, Feu Superbe. Double.
" Single Mixed.
" Double Mixed
White Ceres. Double; tinted rose.
White, The Bride. Single; pure white.... 2 for 5 cts .
Rose, Rosette. Double; rose; extra large
Apennina, Blue. Clear blue, star-shaped flowers; excellent for naturalizing....... .
Apennina, White
Fulgens. Scarlet............ . . 05
Double. Mixed colors.
3 for 10 cts.
Single. Mixed colors.
2 for 5

60
12 I 00
IO I 00

APIOS tuberosa. Hardy climber, with clusters of fragrant Each Doz. 100 purple flowers............ \$0 05 \$0 $40 \$ 200$

## ARUM Dracunculus.

$20 \quad 200$
cornutum (Red Calla) ....... . $20 \quad 200$
crinitum
italicum (Dragon ................... $45 \quad 450$
italicum (Dragon Flower).
Creamy white............. o6 50
maculatum...................... 12 I 25
palæstinum sanctum (Black Calla)...................... $20 \quad 200$
BABIANA, Mixed. For pots.... o6 503 oo
BLOOMERIA aurea. Light yellow........ . . . . . . . . . . . . . . .
CALADIUM esculentum.
7 to 9 inches in circ..... Io I 00
Io to II inches in circ..... I5 I 50
12 inches in circ. up.. 20200
CALLA Elliottiana, Yellow; Spotted Leaf. Dark green leaves, spotted silvery white...... 35350
CAMASSIA Cusickii. Very large leaves and lovely, pale sky-blue flowers, produced in racemes 2 to 3 feet long. esculenta. Pretty violet-blue flowers. Fine for cutting....
3 for ro cts... flowers. Fine for cutting....
3 for Io cts..

15 I 50
$30 \quad 175$
COOPERIA Drummondii (Evening Star). White ...........
$05 \quad 35 \quad 200$
peduncularis. Beautiful, white, fragrant flowers..... $05 \quad 35 \quad 200$
CROCOSMIA aurea (Tritonia). Half-hardy; orange flower...
$\begin{array}{llll}10 & 85 & 6\end{array}$
CINNAMON VINE. Roots.... 06 $50 \quad 300$
CLEMATIS coccinea. A hardy herbaceous perennial climber; flowers rich scarlet.


Spiræa, Washington. Extra-large Each Doz. 100 flowers; fine forcer......... \$0 $20 \$ 200$
aruncus. Handsome plant, with large plumes of pure palmata. Crimson; strong clumps...................... fall-flowering; hardy........ RILLIUM erectum. Dark purrandiflorum (Giant American Wood Lily). Large, white lowers, changing to rose, quite hardy and easily grown
ovatum. White changing to essile californicum. A strong plant, I foot high, with the separate leaves $51 / 2$ inches long by $41 / 2$ inches wide and petals $31 / 2$ inches long. Flowers pure white, with purple centers; very fra-
sessile rubra. Same as Californicum, with narrow petals; deep maroon-purple to reddish purple.
$\begin{array}{llll}15 & 1 & 25 & 800\end{array}$
essile, Snow Queen. Flowers pure white, with creamy centers and with broad petals.
$\begin{array}{llll}15 & 1 & 25 & 800\end{array}$
MA Pfitzeri. Large spike of intense flame - colored flowers. Plant in spring. . . .

15 1 501000

$06 \quad 60 \quad 350$
TROLLIUS caucasicus. Golden
Europæus. Yellow............. 20 I 75
giganteus. Yellow............ 20200
TROPFOLUM tricolor (Jarrattii). Fine greenhouse climber; for pots. $20 \quad 200$
speciosum. Brilliant scarlet. 20200
pentaphyllum................. . 40 400
$\begin{array}{cclll}\text { TUBEROSES, Dwarf Double... } & 05 & 40 & 2 & 25 \\ \text { Albino. Pure white; single.... } & 06 & 50 & 300 \\ \text { Variegated Leaf.............. } & 06 & 50 & 300\end{array}$
WATSONIA Ardernei (O'Brieni). Large, beautiful, snow-white gladiolus-like blooms over 3 inches in diameter. Fine forcer or for planting outHYRANTHUS candida. White, greenish base....... io i oo 600
atamasco. Pure white........ ough Lily

35350

## Insecticides and Remedies for Plant Diseases

All subject to change in price. If wanted by mail, add I6 cts. per lb. to cover postage

ANT DESTROYER. Will positively destroy red or black ants. $1 / 4-1 \mathrm{~b}$. tins 15 cts., $1 / 2-1 \mathrm{~b}$. tins 28 c ., I-lb. tins 50 cts., $5-\mathrm{lb}$. tins $\$ 2.50$.
ANTIPEST. A sure destroyer of all insect pests. Qt. 45 cts., $1 / 2$-gal. can 65 cts., gal. can $\$ \mathrm{r} .25$.
APHINE. Has no equal for the destruction of green, black or white fly, thrips, red spider, mealy bug, etc. Used one part to forty of water. Does not injure the most tender plants. $1 / 4 \mathrm{pt} .25 \mathrm{cts}$., $1 / 2 \mathrm{pt}$. 40 cts., pt. 65 cts., qt. \$I, gal. \$2.50.
ARSENATE OF LEAD. Adheres well to foliage and does not readily wash off. It remains well suspended in solution, insuring even distribution. It is white and shows just where it has been applied. It does not injure tender foliage. Lb. $16 \mathrm{cts} ., 5 \mathrm{lbs} .75 \mathrm{cts}$., I 0 lbs . \$13.
BORDEAUX MIXTURE, or FUNGIROID. For all fungous diseases. Dry, I-lb. box 20 cts., 5 lbs . and over at 18 cts . per lb., $50 \mathrm{lbs} . \$ 7$. Liquid, qt. 40 cts., gal. \$I.25, 5 gals. \$5.
BUG DEATH. This is a fungicide, insecticide and plant food combined and contains neither paris green nor arsenic. $\mathrm{I}-\mathrm{lb}$. pkg. I5 cts., $3-\mathrm{lb}$. pkg. 35 cts., $5-\mathrm{lb}$. pkg. 50 cts ., $\mathrm{I} 21 / 2-\mathrm{lb}$. pkg. $\$ \mathrm{I}$, IOO-lb. pkg. \$7.50.
COPPER SOLUTION, Ammoniated. Prevents black and brown rot, mildew and other grape diseases; pear and apple scab, leaf blight, tomato rot, potato blight, melon blight, etc. Dilute I part to 100 of water; spray lightly. Qt. 50 cts ., gal. \$1.50.
CUTWORM PREVENTIVE. Of inestimable value. See p. ${ }^{156.5} 5$ - lb . can 50 cts ., 10 lbs .90 cts . ; in bbls. of 250 lbs . at 6 cts . per lb.
DALMATIAN INSECT POWDER. Effective against almost all insects. $1 / 2-1 \mathrm{lb}$. box 30 cts ., I-lb. box 50 cts.
FIR-TREE OIL. Dilute I pint to 20 gallons water. Apply with vaporizer or syringe. $1 / 2 \mathrm{pt} .40 \mathrm{cts}$., pt. 75 cts., qt. $\$ \mathrm{r} .25,1 / 2 \mathrm{gal} . \$ 2.25$, gal. $\$ 4$.
FIR-TREE OIL SOAP. Mix at the rate of I ounce to a gallon of water, and apply with a bellows or syringe. $1 / 2-\mathrm{lb}$. tin 25 cts ., $2-\mathrm{lb}$. tin 75 cts .
FISH-OIL SOAP (formerly called Whale-Oil Soap). For washing trees and destroying all insects on the bark. I-lb. box 15 cts., 5 lbs. 50 cts., 10 lbs. 90 cts., Ioo lbs. \$7.
GRAPE DUST, Hammond's. For the prevention of mildew on roses, grapes, gooseberries, etc. Apply with bellows. $5-\mathrm{lb}$. pkg. 35 cts ., $10-\mathrm{lb}$. pkg. 60 cts ., 100 lbs . $\$ 5$.
HELLEBORE. Apply dry or mix in water-r oz. to 3 gals. $2-\mathrm{lb}$. box 45 cts ., $\mathrm{I}-\mathrm{lb}$. box 25 cts., Io lbs. and up at 19 cts. per lb.
KEROSENE EMULSION. For cabbage worms, scale on trees, caterpillars, melon louse, rose bugs, etc. Dilute 25 to 50 parts. Qt. 40 cts ., gal. $\$ \mathrm{I}$.
LEMON OIL. For destroying scale, caterpillar, mealy bug, etc. Directions on can. $1 / 2 \mathrm{pt} .25 \mathrm{cts}$., pt. 40 cts., qt. 75 cts., gal. \$2.
LIME-SULPHUR SOLUTION, California Wash. For San José Scale. One gallon makes 15 by adding water. Qt. 40 cts., gal. \$1, 5 gals. \$3.50, in bbl . lots 50 cts. per gal.

NICO-FUME LIQUID. For fumigating or spraying. Effective against green fly, mealy bug, etc. Does not stain or injure blooms, and leaves no disagreeable odor. For spraying, I to 2 teaspoonfuls to a gallon of water. $1 / 4 \mathrm{pt} .50 \mathrm{cts} ., \mathrm{pt}$. $\$ \mathrm{I} .50,1 / 2 \mathrm{gal}$. $\$ 5.50$, gal. $\$$ Io.50. Lamps, 50 cts. each.
NICO-FUME TOBACCO PAPER. For fumigating. Does not injure blooms. In tins, 24 sheets 75 cts., I44 sheets $\$ 3.50,288$ sheets $\$ 6.50$.
NICOTICIDE. For fumigating or spraying. Effective against green fly, mealy bug, etci. Does not damage foliage or flowers. Sold in cans as follows: No. I, I pt., sufficient for 32,000 cubic feet of space, $\$ 2.50$ each; No. 2, $1 / 2 \mathrm{pt}$. sufficient for 16,000 cubic feet of space, \$I.25; No. 3, 4 ozs., sufficient for 8,000 cubic feet of space, 70 cts. Gals., \$I5 each, $1 / 2 \mathrm{gals}$. $\$ 8.25$ each, qts. $\$ 4.50$ each. Fumigators, 50 cts.
NIKOTEEN. Pint cans $\$ \mathrm{I} .50$ each.
PARIS GREEN. Mix at rate of I lb . to 200 gals. of water. Effective against all chewing insects. I-lb. can 35 cts., $1 / 2-\mathrm{lb}$. can 20 cts ., $1 / 4 \mathrm{lb}$. can 12 cts .
SCALECIDE. For San José Scale. Petroleum oil that mixes at once with cold water and stays mixed. No hot water necessary. Add I gallon for every 15 to 20 gallons of water. Qt. 40 cts ., gal. \$1, 5 gals. \$3.25.
SLUG-SHOT (Hammond's). Excellent for destroying cabbage, turnip and beet fly, potato bugs, currant worms, etc. I-lb. pkg. 12 cts., $5-\mathrm{lb}$. pkg. 30 cts., 10-lb. pkg. $50 \mathrm{cts} ., 100-1 \mathrm{lb}$. pkg. $\$ 4.50$.
SULPHO-TOBACCO SOAP. Dissolve in proportion of 2 ounces to a gallon of water, and apply with a syringe or atomizer. It will destroy rose slugs, aphides, green fly, bark-lice, etc. 3-oz. box Io cts., $8-\mathrm{oz}$. box 20 cts., Io-lb. box $\$ 3$.
SULPHUR, POWDERED. Valuable for protecting against mildew on grapes, roses, etc. Lb. Io cts., Io lbs. 60 cts .
TOBACCO DUST-
Ordinary Kind. For dusting. Lb. Io cts., 5 lbs. 35 cts., Io lbs. 60 cts., IOO lbs. $\$ 3$.
Stoothoff's "Black Stuff." For dusting. 50 lbs. $\$ 2.25$, 100 lbs . $\$ 4$.
Stoothoff's "Fumigating Kind." For burning. 50 lbs. $\$ 2.25$, Ioo lbs. $\$ 4$.
TOBACCO STEMS. For fumigating. Bale of about IOO lbs. $\$ \mathrm{I} .75,200 \mathrm{lbs} . \$ 3.25,400 \mathrm{lbs} . \$ 5.50$.
TREE TANGLEFOOT. A sticky substance applied directly to the bark. To protect trees against climbing insect pests. One application remains sticky, fully exposed to weather, three months. One pound will make a band 7 to 8 feet long. I-lb. can 30 cts ., 3 lbs .85 cts ., Io $\mathrm{lbs} . \$ 2.65,20 \mathrm{lbs}$. $\$ 4.80$.
WEED-KILLER, Pino-Lyptol. This fluid absolutely destroys all weeds and other growth wherever applied. Mix one part Pino-Lyptol with ten or fifteen parts water. I-gal. can $\$ \mathrm{I} .50,5-\mathrm{gal}$. can \$5.50, ro-gal. can \$1o.
X-L-ALL LIQUID INSECTICIDE. For spraying. Purely nicotine; harmless to very delicate plants; kills mealy bugs, red spider and all insect pests. Pt. $65 \mathrm{cts} .$, qt. $\$ \mathrm{I}, 1 / 2 \mathrm{gal} . \$ \mathrm{I} .75$, gal. $\$ 3.50$.

# High-Grade Fertilizers 

ALL NET CASH

## THORBURN'S COMPLETE MANURE

Guaranteed to contain ammonia, 3 to 4 per cent; available phosphoric acid, 6 to 8 per cent; actual potash, 6 to 7 per cent; sulphate of magnesia, soda, lime, sulphuric acid, etc. Adapted for use on all crops, such as corn, tomatoes, peas, etc., and is especially suited for grain crops. Use 1,200 to 1,500 pounds to the acre. In $167-\mathrm{lb}$. bags, per ton.
$\$ 40$ oo
Single bags of 167 lbs .
400
Per bag of 100 lbs .
275
1
1
50 lbs.
25 lbs.
1 oo
io lbs.
50

## THORBURN'S LAWN FERTILIZER

Guaranteed to contain ammonia, 6 to 7 per cent; available phosphoric acid, all soluble, 8 to io per cent; actual potash, 5 to 6 per cent; lime, sulphate of magnesia, soda, sulphuric acid, etc. Specially prepared for lawns and meadows as a top-dressing. Apply broadcast at rate of 1,000 to 1,500 pounds to the acre.
In $167-\mathrm{lb}$. bags, per ton.
\$50 00
Single bag of $167 \mathrm{lbs} . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . .$.
Per bag of ioo lbs.
325
50 lbs. 30
200
25 lbs. I 25
Io lbs.
75

## ACME NO. 1 POTATO MANURE

Guaranteed to contain ammonia, 4 per cent; available phosphoric acid, 6 per cent; actual potash, io per cent; sulphate of magnesia, soda, lime, sulphuric acid, etc. This manure is for special use on the potato crop, and is also adapted to sweet potatoes, vines, fruit trees, etc. Use broadcast, about $\mathrm{I}, 500 \mathrm{lbs}$. to the acre. In $167-\mathrm{lb}$. bags, per ton
$\$ 4400$ Single bags of 167 lbs. 450 Per bag of 100 lbs . 315
50 lbs. $\begin{array}{ll}3 & 15 \\ 1 & 75\end{array}$
25 lbs. I 00
ro lbs.

## CLAY'S CELEBRATED FERTILIZER

One of the best manures for all horticultural purposes, either in greenkouse or garden. Splendid for mixing with potting soil and as a top-dressing. Notwithstanding its apparently high price, it is quite economical.

## PRICES IN BAGS

I cwt. (II2 lbs.).
. 7 oo
1/2cwt. ( 56 lbs.)........................................ . . . 4 по
$1 / 4 \mathrm{cwt}$. ( 28 lbs .).
225
$1 / 8$ cwt. (I4 lbs.).
I 25

## AGRICULTURAL SALT

For asparagus beds, etc., in bags of about 200 lbs ., $\$ 1.25$ per bag; about $\$$ io per ton. Not less than one bag sold.

## THOMPSON'S VINE MANURE

Unrivaled for vines, tomatoes, cucumbers, fruit trees and all foliage, flowering and fruit-bearing plants, also for vegetables and outdoor plants of every description. The result of many years' practical experience. Per cwt. (II2 lbs.), $\$ 7$; $1 / 2 \mathrm{cwt}$ ( 56 lbs ), $\$ 4$.

## BOWKER'S AMMONIATED FOOD FOR FLOWERS

Excellent for use on house plants, being entirely odorless. Small pkg. 15 cts. each, by mail, 25 cts. Large pkg. 25 cts. each, by mail 45 cts.

## CANADA HARD-WOOD ASHES

Highest grade unleached. For top-dressing lawns, especially if the soil is stiff or sour, $11 / 2$ to 2 tons to the acre. Price, in bags of roo lbs. $\$ \mathrm{I} .50$; ton, $\$ 22$.

## BONORA

A fertilizer and plant-food combined.



## PULVERIZED SHEEP MANURE

(Sheepshead Brand)
A rich, pure, natural manure. Excellent as a topdressing for lawns. Its effect is immediate and lasting. There is nothing better for mixing with the soil for greenhouse plants-one part manure to six parts soil: It is recommended for the vegetable garden, promoting a steady and rapid growth. It makes a rich and safe liquid manure- 1 pound to 5 gallons of water.
I-lib. package....... . . . . . . . . . . . . . . . . . . . . . . . . . . \$o 10
5-1b. package . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 25
25 lbs........ . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 75
50 lbs................................................. 125
100 lbs................................................. . . . 200

500 lbs . and up at ton rate.

## BONE FERTILIZERS, ETC. PRICES SUBJECT TO CHANGE

Pure Ground Bone Meal, No. x. Finely pulverized; excellent for rose-culture. It decomposes very rapidly, and is more quickly effective than the coarser grades. It is excellent for mixing with the soil for potting. 5 lbs. 25 cts., 10 lbs. 40 cts., 25 lbs .75 cts., 50 lbs . $\$ \mathrm{I} .25$, ioo lbs. $\$ 2.25$, ton $\$ 33$.
Ground Bone, No. 2. Coarser than the above; for topdressing for lawns, and for garden and field crops. 100-lb. bag $\$ 2.50$, ton $\$ 38$.
Ground Bone, No. 3. A little coarser than No. 2. 100 lbs. $\$ 2.75$, ton $\$ 40$.
Pure Raw Bone Meal, Swift's. Contains $4 \frac{1}{2}$ per cent ammonia and 23 per cent phosphoric acid, and over $31 / 2$ per cent nitrogen. 100-1b. bag $\$ 3,200-1 \mathrm{~b}$. bag $\$ 5 \cdot 50$, ton $\$ 45$.
Leaf-Mold. Indispensable for azaleas, rhododendrons, etc. Bbl. \$2.
Moss, Sphagnum. For filling orchid baskets, etc., and for mixing with potting soil to preserve moisture. Bale of about 50 lbs. $\$ 3.50$.
Peat, Orchid. For potting orchids, etc. Barrel of about 50 lbs . $\$ 2$.
Peat, Rotted. Fine for mixing with soil for potted plants such as azaleas, palms, etc. Barrel of about 140 lbs. \$2.

## OTHER FERTILIZERS PRICES FLUCTUATE

ACID PHOSPHATE. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . Per 10o-lb. bag $\$ 1.50,200-\mathrm{lb}$. bag $\$ 2.50$, per ton $\$ 20$
TANKAGE (Blood and Bone Fertilizer) . . . . . . . . . . . . . . . . . Per 100-1b. bag $\$ 3$, per $200-\mathrm{lb}$. bag $\$ 5.50$, per ton $\$ 40$ IMPORTED SCOTCH SOOT . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . Bags of about II2 lbs., per bag $\$ 3.50$ NITRATE OF SODA. .......... 5 -lb. pkg. 30 cts ., $10-\mathrm{lb}$. pkg. $50 \mathrm{cts} ., 25 \mathrm{lbs}$. $\$ \mathrm{I} .25,50-\mathrm{lb}$. bag. $\$ 2$, 100 lbs . $\$ 3.75$ MURIATE OF POTASH . .............. 5 -lb. pkg. 30 cts ., $10 \mathrm{lbs} .50 \mathrm{cts} ., 25 \mathrm{lbs} . \$ \mathrm{I} 25,50 \mathrm{lbs} . \$ 2,100 \mathrm{lbs} . \$ 3.50$

# HORTICULTURAL IMPLEMENTS AND GARDEN REQUISITES 

## ALL NET CASH



Asparagus Buncher, Acme. \$2. Asparagus K nife, English. (Saw blade.) \$1.25.


Asparagus Knife Granite State. 35 cts.

## Atomizer.

 Large, \$2.Small, \$1.50.


Bellows, Woodason's Double Cone Powder. \$3.


Bill and Brush Hooks. For heavy pruning. -
English. S-handle. \$2.75.
American. Long handle. \$I.
Border Shears. See Shears, p. I49.
Carnation Supports. See under
Supports, p. I 50.

Dandelion Puller. Hall's. 50 cts .


Dibbles. All iron, 35c. Wood Handle. Brass point, 65 cts . Iron point, 40 cts .

Edging Knives, Grass. English. \$I. 75 to \$2.25 each.
Extension Pole grips. 25 cts.
Flower Pots. See p. ${ }_{52}$.

FORKS, Digging or Spading. Best-quality spear point, dia-mond-back tine. Strapped handle. Long or D-handle. 4-tine. . . . . . . . . . . . . . . . \$r 00
5-tine. . . . . . . . . . . . . . . I 25
Hay or Stable. First-quality oval tines. Extra-long-strapped handle. 2-tine.
3-tine. 4-tine................. . . .
Manure, Long- or Shorthandled. Strapped handle, 4 -tine......... I 00 5-tine..................... I I 25 Extra-heavy diamond tine. 4-tine............ I 35 5-tine................... 185 Ladies' Weeding, English. Boys' Spading. 4-tine. 65

Fruit-Pickers, Handy Andy. A simple device of two wire jaws bound in the form of a square cage with burlap. The jaws open and close with a spring on the end of the pole. A cloth tube is affixed to the pole, the end of which can be held in a box or barrel or other receptacle to catch the fruit as it runs down the tube. $\$ 2.25$.
Perfect. Galvanized steel wire; attaches to pole of any length. Price, without pole, 50 cts.

Fumigating Lamp, "Defiance." For all vaporizing liquids. No glass. Burns kerosene. 60 cts.
For Nico-Fume. 50 cts.
Fumigator, "Eureka." For fumigating with tobacco stems.
No. I holds $1 / 2 \mathrm{pk}$. $\$ \mathrm{I} 50$
No. 2 holds I pk.. 200
No. 3 holds $1 / 2$ bus. 250


Garden Lines, Finest Braided. 100 feet, 50 cts.
Garden Tools for Ladies. Set of 3 pieces (spade, hoe and rake) \$I


Glazing Points, The Tiger. 50 cts. per I,ooo.
Pincers. For above. 50 cts .

Glass Cutter, "Red Devil." Handhoned wheels. Standard of the world. 4 styles. 10, 15,25 and 50 cts . ea.
Gloves, Gardener's, Goatskin. \$1.
Grafting Wax. The best grade. $1 / 4 \mathrm{lb}$. pkg. Io cts., $1 / 2 \mathrm{lb}$. pkg. $15 \mathrm{cts} ., 1 \mathrm{lb}$. pkg. 25 cts.
Grass Clippers. See p. 153.
Grass Edging Knives, English. \$1.75 to \$2.25.
Handle io cts. extra.
American. With
handle. 50c.


Adjustable. 40c., by mail 55c.
Grass Hooks, English Riveted Back. Thin, sharp blades, strengthened by a riveted back; light and rapidly handled. Small size. 50 cts. Medium size. 55 cts . Large size. 60 cts.
Trowel Shank. The handle is raised from the blade, making it possible to cut close without bruising the knuckles. 50 cts.
Hotbed Sash. Best quality. Packing at cost.
Unglazed. $3 \times 6 \mathrm{ft}$. $\$ \mathrm{I} .20$ each. \$I3 per doz.
Glazed and Painted. $3 \times 6 \mathrm{ft}$. Io $x$ I2 glass. $\$ 3.50$ each, $\$ 38$ per doz.
Glazed and Painted. $3 \times 6 \mathrm{ft}$. ro x I2 double glass. $\$ 4.75$ each, $\$ 54$ per doz.
Hotbed Mats for Covering Sashes.
 Made of jute, stitched through; hemmed with canand -vas and thickly padded; size, 76 inches by 76 inches; one mat covers two sashes.
No. I. Both sides jute. $\$$ I. 50 each, \$16 per doz.
No. 2. One side jute, the other side waterproof duck. \$2 each, \$22 per doz.

HORTICULTURAL IMPLEMENTS AND GARDEN REQUISITES, continued
HOES, Draw or Corn. 45c. to 50c. Draw, Self-sharpening. 7 in. 60 c . English Scuffle. Handle, ioc. extra.
5 -in.


6-in.
7 -in.
8 -in.
9-in.
Grub.
Triangula. 85c. to I 50 Handle Ioc. extra. Warren. Solid steel socket; used in drilling seed.
$65 \mathrm{c} ., 75 \mathrm{c}$. and 85
Hose, Rubber. See page ${ }^{5} 52$.
HOSE END, No. I. For connecting hose with ordinary faucets. 50 cts . each.

HOSE COUPLERS, Siamese Each With these several sprinklers can be used at the same time. $3 / 4$-inch...... $\$$ I-in.
HOSE COUPLINGS. -
1/2-in.
3/4-in.
I-in.
HOSE NOZZLE, "Bor- Each deaux." For $1 / 4$-in. pipe or $1 / 2$-in. hose
Graduating Spray Nozzle.
Will throw coarse or fine spray, or solid stream. $3 / 4$-in. by mail.
hower Spray Nozzle. A perfect spray n oz z 1 e made of brass; non-corrosive-will not clog.
No. 1. Fine for spraying Each trees, etc. Standard $14^{-}$ in pipe thread.
No. 2. For light garden work, whitewashing, washing carriages, automobiles, etc. Standard 1/4-in. pipe thread. \$I. 25 . Vermorel Nozzle. 85 cts.
HOSE BANDS, for hose
couplings.
To fit $1 / 2-\mathrm{in}$. hose
Per doz.
To fit $3 / 4$-in. hose
To fit I-in. hose.
HOSE MENDERS, Cooper's. Brass; will not rust or wear. No fastening required.
For hose with $3 / 4-\mathrm{in}$. bore, 7 cts . each, 75 cts. per doz.
For hose with I -in. bore, 8 cts . each, 85 cts. per doz.

Each $\$ 060$

Each
$\$ 020$
25 \$0 80
\$I 25


No. 938 No. 196 No. 187 No. 312 No. 80 \$1.75 \$2.25 \$1.50 \$1.50 85c.

No. $400, \$ 1.50$ No. $401, \$ \mathrm{I} .50$ Saynor's No. 343. Budding. 2 blades. \$1.75.
Saynor's No. 403. Budding. Long-handled. \$1.75.
Wostenholm's Combined Pruner and Budder. \$1.25.
Pruner only. 80 cts .
H. \& B. Budders. 2 blades. \$I.

Labels, Wooden, Pot and Garden.

$$
\overbrace{\text { IOO }}^{\text {PLAIN }} \overbrace{I O O O}^{\text {PAINTED-000 }}
$$

 $41 / 2$ in. $15 \quad 80 \quad 20 \quad 1 \quad 00$ | $5-\mathrm{in}$... 20 | 90 | 25 | 1 | 10 |
| :--- | :--- | :--- | :--- | :--- | :--- | 6-in... 25 I oo 30 I 35 8-in... $45 \quad 350 \quad 50 \quad 400$ 12-in... $75 \quad 6 \quad 00 \quad 85 \quad 700$ 24-in. 250

Wooden Notched Tree-
$\begin{array}{llllll}31 / 2 \text {-in. } 10 & 70 & 15 & 90 \\ 6 \text {-in. } & 25 & 2 & 25 & 30 & 25\end{array}$
6-in... $25 \quad 2 \quad 25 \quad 30 \quad 275$
$3^{1 / 2-i n}$.
cop. wire $20 \quad 1 \quad 20 \quad 25 \quad$ I 50
Tree, Waterproof Flexible. Copper-wired. In boxes of Ioo only, \$I. 50 per box.


All Proof Tree Labels. "Blenheim Orange." With or without rings.

Per doz.
3 -in. without rings. ...... . \$0 40 Rings for same.

10



Mole Traps, Olmsted's Improved. A short trap, suitable for lawns or coldframes. \$1.50.
The Reddick. A powerful trap used princi-
 pally on lawns. Easily set. Made of galvanized iron. \$I each, \$9.50 per doz.
Little Giant. A small trap made of galvanized iron. Will not get out of order; self-setting. 50 cts .


PENCILS, for writing garden $\begin{array}{lrr}\text { labels. } & \text { Each } & \text { Doz. } \\ \text { Black............... } & \text { 05 } & \text { \$0 } 50 \\ \text { Wolf's Indelible. } & 08 & 90\end{array}$

Plant Duster, Dickey's. 25 cts.
Norton's. 85 cts.
PLANT STAKES, Round, Painted Green-


Dahlia Poles-Painted Green,

| White Tops.- | Doz. |
| :---: | :---: |
| 2 feet | \$0 75 \$4 50 |
| 3 feet | 00 6 50 |
| 4 feet | I 259 |
| fe | I 5011 |
| 6 fee | I 7513 |

HORTICULTURAL IMPLEMENTS AND GARDEN REQUISITES, continued

Plant Stakes, Galvanized Wire, for Roses, etc. Doz. 100
2 feet. . . . . . . . . . .\$0 30 \$2 00
3 feet. . . . . . . . . . . . 40 250
$\begin{array}{llll}4 \text { feet. . . . . . . . . . . . . . . . . . . } & 50 & 300 \\ 5 \text { feet. . . . } & 30\end{array}$
JAPANESE BAMBOO. Bundles of ioo only. $6 \mathrm{ft} . \$ \mathrm{I} ; 8 \mathrm{ft}$. \$1.25.
PRUNERS, Waters' Long-handled Tree Each Each 4 feet.... \$0 $75 \mid 8$ feet... \$1 oo 6 feet . . . . 80 Io feet... I Io Extra Blades 25

Putty for Glazing, Twemlow's Old English. Can be used with machine or bulb. \$I. 75 per gal. 5 - and Io-gal. buckets at \$1.60 per gal.


Raffia, for tying. Per lb. 20 cts., 5 lbs. 90 cts., io lbs. \$1.75.
RAKES, English or Daisy. 16 teeth, $\$ 3$.


Fine-Tooth Steel Gravel. Each 16-teeth
\$0 75 18-teeth 80
Hay, 3-bow (Wood)
The "Lawn King." Teeth very close. Will not tear sod. 26-teeth size. 38-teeth size.
Steel Garden Rake. -
Each 1 14-teeth..
10-teeth...\$0 50 16-teeth...
12-teeth... 55 18-teeth..
Wire Lawn Rakes. Will not scratch the lawn. With handle

50
Wooden. For lawns.
40
Reels, for rubber hose. See p. 152.
SAWS, Little Giant Saw and Each Pruner Combined
d..... row blade, gets among close branches; upper edge smooth, does not cut the upper limb.
16-in.
I 8 -in.
20-in.
70
80
90


Adjustable-Blade Pruning. Can be adjusted and used at any angle; cuts cleanly and rapidly; light and strong. \$I.


Saucers, Flower-Pot, Indurated Wood-Fiber. Light and durable. Not porous; will protect tables on which plants stand.
 8 -inch............. I8 I 90 10-inch............ $20 \quad 220$ I2-inch............ $24 \quad 260$ 14-inch:............ $30 \quad 3 \quad 30$
SEEDER, Cahoon. $\$ 3.75$.

## SCYTHES.-

English Lawn, Riveted Back. Light and thin, broad blades. 32-in., \$I.50; 34 -in., \$1.60; 36-in., \$1.75; 38-in., \$1.85.
SCYTHE SNATH, or Handle. Patent Loop Heel. \$1.

## SCYTHE STONES-

Round Dressed Talacre. Each Doz. \$1.75..\$0 25 Norton's Emery.......... io


Scissors, German Flowergathering. Combined flower-cutter, holder and wire-cutter. Spring pat- Each tern, ................... \$1 oo


Grape-thinning, English.
6-in.
90
7 -in.
I 25
8 -in.
I 50


English Flowergathering. Will cut and hold the Each flower. 6 -in.
\$1 25
7 -in.
I 50
8 -in. 200


English Watch Spring. \$1.50 ea.
 Perfection No. I, $61 / 2$ inches.... No. 2, $7^{1 / 2}$ inches...... $\$ 2$ oo No. 3, $81 / 2$ inches...... 250 No. $4,9^{1 / 2}$ inches...... 3 oo

shear.
Each
9-in. \$2 25
Io-in.
250

| English |  |
| :---: | :---: |
|  |  |
| Saynor. |  |
| 8 -in | \$2 25 \$2 |
| 9 -in | 250 |
| 10-in | 275 |
| Regulat | $1{ }^{\text {oo }}$ |
| -in | 125 |
|  | 150 |

 trimming grass around edges of paths, etc. Handles 3 ft . long. 8 -in., \$2.25; 9-in., \$2.50; io-in., \$3.
Grass, "Trowel Shank." American, full polished, excellent steel. \$1.


Thorburn's New Grass. This is the most practical grass shear manufactured. It can be taken apart to sharpen; best English steel. 7-in., \$1.25.


American Lopping. For lopping off limbs and branches of trees not over $11 / 4$-in. diameter. Each 2 - ft . handles........... $\$ 1$ oo $3-\mathrm{ft}$. handles............ I 25
English Lopping. No. 3.. 250
No. 4................. 275


SHOVEL, Square Point.-
No. 2. Regulation Long Each or D handle........... . \$0 90
Ames No. 2. Long or D handle.

I 25
Boys'. D handle . . . . . . . 85


## Round Point.-

Each
Long or D handle...... \$0 90
Ames. Long or D handle. I 25

HORTICULTURAL IMPLEMENTS AND GARDEN REQUISITES, continued


SPADES. -
Square Point Spade. No.
2. Regulation long or Each D handle.............. \$0 90 Ames No. 2. Long or D handle. ................ I 25 Boy's Spade. D. H....... 85

Turfing Irons, English. \$4.50 ea.
Spray Pumps. See p. ${ }^{5} 52$.


SCOOP, Vegetable. The best shovel for handling potatoes, apples, etc. Will not cut; dirt sifts out. Light weight. \$1.50.


## SPRINKLERS.-

 Rubber Plant. With large opening in neck; fills quickly;
made of best white rubber.
Straightneck. 6 oz........ \$0 50 10 oz .

90
Angleneck. 6 oz............ 60
Io oz..................... . I 1 oo
By mail, io cts. extra.


Peck's Improved Lawn Sprinkler. Stands 4 ft . high and distributes water over an area from 60 to 100 feet. 4 -arm.. 300 8 -arm. 350
The "New Comet." An adjustable revolving sprinkler. Will sprinkle from 5 to 30 feet. Easily moved. Weight $4 \frac{1}{2}$ lbs. 350

"Twin Comet." A lawn sprinkler in two parts-one slow and three fast revolving arms, distributing the water over an area from 60 to 80 feet. \$5.

w. W. No. 3
 L a w n
Sprinkler No. 55. The most popular ${ }^{3-}$ on the mar-
ket; made of brass, nickelplated, with malleable iron runners. Will cover an area 30 feet in diameter. \$I.25.
Hotchkiss Lawn Sprinkler No. R 65 . This com-
bination sprinkler and fountain is beautiful as well as useful. Brass and nick-el-plated, with malleable iron runners. Will cover an area 40 feet in diameter. \$I. 75 .

## Shower Sprinkler.

 Mounted on holder forsprinklin attached directly to g'arden hose for washing sidewalks,etc. Cannot clog or get out of order; will not rust. Standard $3 / 4-\mathrm{in}$. hose connection. Holder and nozzle complete. \$2.

SUPPORTS, Carnation. Made of light wire, galvanized. 2-ring, 75 cts. per doz., \$5 per 100, \$40 per 1,000; 3 -ring, 90 cts. per doz., $\$ 5.50$ per 100, $\$ 45$ per 1,000.

Supports, Tomato. Made of heavy wire, galvanized. 20 cts each, \$1.50 per doz. Wood, Tomato. 36 in. high, 16 in. wide. Solidly made of clear, straight wood. Can be taken apart and stored when not in use. Will last for years. 25 cts. each $\$ 2.50$ per doz.


SYRINGES. See p. I52.
TROWELS, Solid Steel. Cheapest trowel in the long run; light, strong, durable and perfect "hang;" handle cannot come off. 5 -in. blade, 40 cts.; 6-in., 50 cts.; 7-in., 60 cts .


Steel Socket. One piece. 6-in. 50 cts .
Trowels, Ordinary. 6-in., 2oc.
Trowel, Transplanting. A perfect Trowel for transplanting and putting in bulbs; solid steel. 6-in., I5c.; 7-in. 20c.

## THERMOMETERS-



Oxidized Metal Scale, Polished Back. A thermometer for house use, durable and well made. Will last a lifetime. Tube magnifies and is easy to read. 8 -inch size, 75 c.; 10inch size, $\$$ I; 12 -inch size, \$1.25.
Oxidized Metal Scale, Carved Back. Same as the preceding but with fancy border. 8inch size, 75 cts.; $10-$ inch size, \$I; 12-inch size, \$1. 25.
To get best results from all kinds of clover, as well as beans and peas and sweet peas, use Farmogerm, listed on page 158. The greatest advance in growing certain crops ever known.


## HORTICULTURAL IMPLEMENTS AND GARDEN REQUISITES, continued

Self-Registering, Polished Back. For indoor use; will register extremes of heat and cold; made of hard wood. A magnet is used to draw back the indicating points. Io-in. size, \$2; 12-inch size, $\$ 2.50$.
Self-Registering Japanned Case. The same as preceding, with tin case for outside use. Enameled case and porcelain scale. 8 -in. size, \$2.75; Io-inch size, $\$ 3.25$; 12 - inch size, $\$ 3.75$.

Japanned Tin Case. A cheap
 thermometer for greenhouse use; all metal. Io-inch, 25 cts. each, $\$ 2.50$ per doz.
Hotbed, New Style. Cop-per-sheathed. Tip can be removed and cleaned. \$2.
Mercury Bath, or Hotbed. New. Quick-acting; all of metal. Cannot rust or break. \$2.
Hotbed and Mushroom-Bed. Brass-tipped point encloses the temperature bulb; it is simply thrust into the soil or bed. Best grade (made of boxwood). \$1.25.
Standard Grade (made of soft wood). \$I.
Torch, Asbestos. Very useful and simple. The only sure way to get rid of caterpillars' nests on trees.
Small size. 15 cts.
Large size. 25 cts.
Tree Brush. Small size; fine wire


Tree Brush, Wire. For older trees; can be used with long handle. Price, complete, \$2.

Tomato Supports. See under Supports, p. I50.
Tree Scraper. For scraping diseased bark from trees, removing insect eggs, etc. 50 cts.

Tree Tubs, New York Style. Made of cedar timber, painted green. No. Diam.


Twine, Green Smilax. 2-oz. balls, 50 cts. per lb .
Florists' Linen, Green or Gray. 2-oz. reels, $\$ \mathrm{I} .25$ per lb.


Wheelbarrow, Thorburn's Garden. None better made. Iron braced and bolted. Finished in natural wood, red or green. Steel wheel if desired, 50c. ex. No. 2, Small, \$2.50.
No. 4, Medium, \$3.50.
No. 5, Large, \$4.

## Weeders, Cleveland Lawn. Chisel blade; trigger holds weeds, so they can be pulled out. 60c. <br> 



Lang's Hand. A strap over the finger keeps the tool in the hand while operator's fingers are left free. 20 cts. each, $\$ 2.25$ per doz.
Eureka Hand. The prongs of solid forged steel are thin and long; fine for loosening soil. Short handle. 25 cts.


Magic. Combined weeder and hoe. Fingers of tempered steel. The hoe is useful in loosening hard ground. 35 cts. (postage 5 cts.
each, extra.)

Norcross Adjustable Cultivator. Made of firstclass material, teeth forged from solid steel. Can be entirely taken apart, every piece being detachable. Works between the rows, or center tooth can be removed to straddle row. \$I.

## Watering Pot, French Model.

 Long spout with brass joints, fitted with coarse and fine nozzles. Made of heavy galvanized iron,reinforced with steel rim.
6-qt. . . . . \$2
$\$ 25$
8-qt. ...... 250
10-qt. .... 275
12-qt..... . 300


New Hand. A
 hoe; very useful in the flower garden. Blade I in. x 3 in. 20 cts.


You will have no cutworms in your garden if you use our Cutworm Preventive. See page 153.

## Flower Pots

Best make. Of sizes 2 to 3 inches we do not sell less than ioo, of larger sizes not less than a dozen. We pack carefully in the best manner, but will not be responsible for breakage in transit.

| Size, height and width, inside |  |  |  | 1,000 |
| :---: | :---: | :---: | :---: | :---: |
| $2^{\text {wic }}$ | $h$, inside <br> nches. | Per doz. | \$0 70 | $\$ 550$ |
| 21/4 | " |  | 75 | 625 |
| $21 / 2$ | " |  | 85 | 750 |
| 3 | " |  | I 10 | 975 |
| $31 / 2$ | ، | \$0 30 | 150 | 1300 |
| 4 | , | 35 | I 75 | 1500 |
| $41 / 2$ | ، | 40 | 225 | 2100 |
| 5 | ، | 50 | 300 | 2800 |
| 6 | " | 65 | 425 | 40 00 |
| 7 | ، | I 00 | 700 |  |
| 8 | " | I 50 | 950 |  |
| 9 | " | 200 | 1350 |  |
| 10 | " | . 250 | 1800 |  |
| II | " | . 350 | 2500 |  |
| 12 | " . | 450 | 3500 |  |



## Rubber Hose

(Three-quarter Inch)
Electric. Electric Hose can be cut in any length. 20 cts. per ft . For less than 25 feet, add 15 cts. for couplings.
Thorburn Standard. 5 -ply, II cts. per ft.
X. 6 -ply, 14 cts. per ft.
XX. 7 -ply, 16 cts. per ft.
XXX. Best red, 7 -ply, 18 cts. per ft.

Our hose is carefully selected, made of first-class material, and coupled at both ends, in 25 - or $50-\mathrm{ft}$. lengths.


## Hose Reels

Tubular Iron. Never break or wear out. No. io will hold 100 ft., 34 -in. hose. $\$ 3$. No. 20 will hold 150 ft ., $3 / 4-\mathrm{in}$. hose, $\$ 3.50$. No. 30 will hold 500 ft ., $3 / 4-\mathrm{in}$. hose, $\$ 5$.
The Cardington. A perfect hose reel, will hold 100 ft ., $3 / 4$-in. hose, $\$ 2$.
The Cardington
Garden Reels. Of wrought-iron. Holds $100^{\circ} \mathrm{ft}$. 60 cts .
Large Size, \$I.

## Syringes



No. A. I spray rose and I jet. Length of barrel I2 in., diam. I in. $\$ 2.50$.


No. G. I spray rose and I stream jet, side attachment and elbow-joint for sprinkling under foliage. Length of barrel 16 in., diam. $1 \frac{1}{2} \mathrm{in}$. $\$ 5$.


No. H. Sheet brass with fixed spray rose; length of barrel 16 in., diam. $11 / 2$ in. $\$ 3$.


No. 2. I coarse and I fine spray rose and I jet, side attachment. \$4.50.


No. 3. Large size with I stream and 2 spray roses, with side pieces on barrel. Length of barrel, 18 in., diam. $11 / 2$ in. $\$ 6.50$.
 in all directions, for washing the under surface of the leaves of plants and flowers, cleansing them from insects, etc. Length of barrel, I8 in., diam. $11 / 2 \mathrm{in}$. $\$ 8$.

## Spray Pump, Bucket

Being made of brass, it is not affected by the arsenites used for spraying. Easily operated; throws a solid stream 50 feet. It is provided with a combination nozzle, and also with a sprinkler for flowers. For spraying large trees, an 8 -foot pipe extension is supplied for 60 cents extra. This pump is also valuable for washing windows. Price $\$ 3.75$.

## Spray Pump, Hand

A very useful sprayer for a small garden. Simple and effective; no valves to get out of order. Made of tin or brass. Tin, 75 cts. each; brass, $\$ \mathrm{I}$ each.


Bucket Spray Pump

## Spray Pump, the "Pomona"

A perfect sprayer. Outfit C, with agitator and one lead of 15 feet $1 / 2-\mathrm{in}$. discharge hose, with spray nozzle, $\$ 18.75$. Outfit $D$, with agitator and two leads of 15 feet each $1 / 2$-in. discharge hose, with spray nozzles. With barrel, \$22.

## Spray Pump, Knapsack for vineyard, orchard and field service

 Made entirely of brass and copper, with ballvalves and metal
 plunger all easily accessible. The discharge is at the bottom and the pump can be entirely drained of the liquid. It should be carried on the back with the straps crossed in front. The reservoir is made of heavy copper and will hold about five gallons. Price, complete, with $31 / 2$ feet of $3 / 8$-inch discharge hose, Vermorel nozzle and lance for degorger, \$13. Special agitator, 75 c . extra.

## Spray Pump, "Auto-Spray"

A self-operating sprayer of simple construction, durable, easy to carry and to work. Made of galvanized iron or solid brass, with 4 -ply rubber hose. For spraying trees, cleaning windows, etc. A perfect pump. Price, with brass tank and stop-cock nozzle, \$6.75; galvanized iron tank and stop-cock nozzle, $\$ 4.50$. Brass extension pipe, 2 feet, 45c. extra. Fitted with "AutoPop" nozzle, \$1 extra. "AutoPop" nozzle, if sold alone, \$1.50.


## Spray Pump, the "Fruitall"

Same as Pomona, but smaller. Outfit C, Sprayer with agitator and one lead of 15 feet $1 / 2$-in. discharge hose, with spray nozzle. With barrel, $\$ 13.75$. Outfit D, Sprayer with agitator and two leads, 15 feet each, $1 / 2$-in. discharge hose with spray nozzles, $\$ 17$.


## Water Barrel Truck and Barrel

## COMBINED SPRINKLER, LEAF-RACK AND HAND-CART

The barrel is easily disconnected from the truck, either while full or empty. The following extra attachments can be furnished if required: (I) Box with trunnions and spring catch, forming a dumping hand-cart. (2) Sprinkler for watering walks and lawns. (3) Leaf-rack.
Truck and barrel, 2-inch tire................ $\$$ II oo
" " " 3 " " ................. 1200
Sprinkler Attachment......................... 325
Hand-cart box............................... 3 oo
Leaf-rack.................................... . . 5 oo
Extra trunnions. Per pair.................. 50
If truck and trunnions are wanted without barrel, deduct $\$ 2.25$ from price of
 truck and barrel.


## CUTWORM PREVENTIVE $\underset{\text { EXPRESSLYTURED }}{\text { MANE }}$

[^6]
## The Thorburn Century Ball-Bearing Lawn Mower

Thorburn's Century Ball-bearing Lawn Mower is a marvel of simplicity, as one screw adjusts both bearings. It has a simple, self-adjusting device, which keeps the bearing properly adjusted for a long time, and a double interchangeable rachet. By shifting handle bails from the front to the rear lugs on the side frame, the mower can be made to cut terraces and steep banks.

Manufactured expressly for us, and is, in every respect, the BEST LAWN MOWER ever made.

## NET PRICES

14-inch cut ..... $\$ 850$
16-inch cut ..... 950
18-inch cut. ..... 50
20-inch cut. ..... 50

## Grass-Catcher Boxes FOR USE WITH ANY LAWN MOWER

To fit 14- and 16-in., \$1.

To fit 18 - and $20-$ inch, \$1.25.


## Chain Roller or Golf Mower

This mower is made to meet the demand for a machine that will more perfectly cut borders, verges, etc., and yet retain all the other features necessary in a mower for general work. Its great advantage is the substitution of a bicycle chain for the gears generally used in this style of mower. This reduces the friction to a minimum. The machine with six blades is highly recommended for work on putting-greens.
The Best
for
PuttingGreens

NET PRICES


## Coldwell Improved Horse Lawn Mower

This well-known standard Mower has side draft attachment, to enable the horse to walk on the cut grass only, and caster-rollers which will not mark the lawn. Evenness of cut is assured by an adjustment which raises or lowers the two sides at the same time by means of a simple lever movement; the same lever serves the purpose or raising the knives from the ground when driving over gravel walks or roads.

## NET PRICES, free on board New York

25-inch cut, no shaft. . . . . . . . . . . . . . . . . . . . . $\$ 3800$
30-inch cut, complete. . . . . . . . . . . . . . . . . . . . . 6500
35-inch cut, complete. . . . . . . . . . . . . . . . . . . . 78 oo
40-inch cut, complete. . . . . . . . . . . . . . . . . . . . . 9500


## Horse Boots <br> PREVENT CUTTING UP THE TURF

Made of very strong, heavy leather, closely riveted. Price, per set of four, \$9.


## Handy Grass Clipper and Lawn Trimmer

## GREAT TIME-SAVER. INDISPENSABLE ON EVERY WELL-KEPT LAWN. MADE OF BEST MATERIALS THROUGHOUT

An implement designed to fill a long-felt want. It cuts a swath 5 inches wide and will pick the last blade of grass from around trees and shrubbery. Takes the place of the old-fashioned, unsatisfactory hand grass shears and entirely does away with the necessity of kneeling or stooping. It is self-sharpening and requires no attention except occasional oiling and adjusting. Price, \$3 each.

## The "Velvetlawn" Grass Seeder

18 inches wide

The use of a machine in the seeding of new lawns or grass-plots, the re-seeding of old lawns, the drilling of grass seed into putting-greens, and the renewing of grass plots every month or so has proved a decided success wherever it has been tried. The machine to do this work is the "Velvetlawn" Grass Seeder.

The cutting action of the discs relieves old sod of root-bound conditions by cultivating around the roots.

Each disc automatically conforms to inequalities in the ground.

The discs do not tear the soil; they cut it.
The operator can drill any amount of seed desired.
The "Velvetlawn" Grass Seeder puts the seed into the soil where the birds, wind and rain cannot get at it.


Every feed is a force feed and sows the same amount.
Each seed-trench contains an equal quantity.
"Velvetlawn" Grass Seeders are equipped with adjustable handle, thus insuring ease of operation for any height of man.

All of the seed being planted at an even depth in the soil, the plants must all come up at the same time, and make uniform growth. Price $\$ 15$, net cash.


## Water-Ballast Roller

Roller Bearing. Can Be Filled without Turning on End, with Either Water or Sand (Patented) SUITABLE FOR LAWNS, TENNIS-COURTS AND PUTTINGGREENS. SEAMS ARE ELECTRIC-WELDED, NOT RIVETED

One- or two-section "Water Weight" Rollers, without counterbalancing handle-weights.

| No. | Diam. | Length Sec- in. | $\begin{gathered} \text { Weight } \\ \text { empty } \\ \text { ems. } \end{gathered}$ | $\begin{gathered} \text { Weight } \\ \text { filled } \\ \text { water wr, ths. } \end{gathered}$ | Weight filled with sand, lbs | Price |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WB3 | 14 | 20 | 60 | . 200 | 30 | \$9 oo |
| WB5 | . 18 | . . 24 . . 1 | . 75 | . 300 | . 500 | 12 |
| WB7 | . 24 | . 24 | . 125 | . 500 | 800 | 15 |
| WBr | 18 | 24 | . 100 | . 300 | . 500 | 16 |
| WBis |  |  |  | . 650. |  | 22 oo |
| If handle-weight is desired, add \$ $\mathrm{I}^{\text {r }} 50$ to above prices. |  |  |  |  |  |  |




## Clark's A5 Double-Action Cutaway Harrow

This Harrow will cut and reduce the toughest sod to plantfood without the aid of a plow. It will cut from 28 to 30 acres, or will double-cut 15 acres in a day. It can be set so as to move the earth but little, or at so great an angle as to move all the earth I foot. It keeps the surface true and the machine runs true in line or draft. Price, $\$ 32$ net, f. o. b. factory (Conn.).

## Cutaway Grading or Smoothing and Leveling Harrow

With this tool any field can be made smooth and the soil pulverized fine enough for a flower-bed. Will smooth an acre in twenty minutes. It is adjustable with a lever, by which the entire action is controlled by the driver, and he can remove at will all the earth possible for the team to haul, taking it from hills or uneven places and putting it into hollows, to level up the field. For one horse ( 6 feet wide), $\$ 13 \cdot 50$. For two horses ( 8 feet wide), $\$ 15.50$, f. o. b. factory (Conn.).

Cast-Iron Hand Lawn Rollers, with Roller Bearings
(Patented)


Diam. Length Sections Weight, lbs. . | Net price |
| :--- |

In our list of Horticultural Implements and Garden Requisites, beginning on page 147 , will be found many things which will add to the pleasure of gardening

## "PLANET JR." FARM and GARDEN TOOLS

Illustrated catalogue describing fully many other "Planet Jr." tools mailed on application. Prices are quoted net, f. o. b. New York.

## "Planet Jr." No. 4 Combined Hill and Drill Seeder, Single Wheel Hoe, Cultivator and Plow

This admirable tool combines in a single convenient implement a capital hill-dropping seeder, a perfect drill seeder, a single wheel hoe, a cultivator, and a plow. It holds two quarts and as a seeder sows in continuous rows or drops in hills at five different distances.

## EQUIPMENT

$$
\begin{array}{ll}
\text { I pair } 411 / 2 \text {-inch Hoes } & \text { I Garden Plow } \\
3 \text { Cultivator Teeth } & \text { I Leaf Guard }
\end{array}
$$

Weight complete, 53 lbs . Price, $\$ 1 \mathrm{I}$; as a seeder only, $\$ 9$

## "Planet Jr." No. 11 Double Wheel Hoe, Cultivator and Plow

This perfected wheel hoe is invaluable for use in all small crops. Its variety of work is almost incredible. Changes and adjustments of the tools are made with the greatest quickness. It has II-inch wheels, which can be set at four different distances apart; the frame is steel with ample room for tool adjustment and can be set at three different heights.

EQUIPMENT

| pair 6-inch Hoes, Oil-tempered | I pair Plows | 25 -tooth Rakes |
| :---: | :---: | :---: |
| I pair $41 / 2$-inch Hoes, Oil-tempered | 2 3-tooth Rakes | 2 Leaf Lifters |
| pair Hollow Steel Cultivator Teeth Weight, 37 lbs . | Price, \$9 |  |

## No. 12. Double Wheel Hoe, Cultivator and Plow

Identical with No. II Wheel Hoe, except fewer attachments

## EQUIPMENT

| I pair 6-inch Hoes |  |
| :--- | :--- |
| 2 pair Hollow Steel Cultivator Teeth | I pair Plows <br> Weight, 37 lbs.$\quad$ Price, $\$ 7$ |

> No. 13. Double Wheel Hoe
> Same as No. 12 , but Hoe only
> Weight, 20 lbs. $\quad$ Price, $\$ 4.75$

## "Planet Jr." No. 8 Horse Hoe and Cultivator



4 3-inch Plates
I 4 -inch Plate

Probably no other cultivating machine is so widely known as the "Planet Jr." Combined Horse Hoe and Cultivator, for it is in use throughout the civilized world. It is so strongly built as to withstand incredible strain, yet it is light and easy to handle. The frame is extra long and extra high, making a tool that will not clog easily.

## EQUIPMENT

2 Side Hoes I 7 -inch Shovel
Weight, 82 lbs. $\quad$ Price, $\$ 9$; without depth-regulator (No. 7), $\$ 8.50$

## "Planet Jr." No. 25 Combined Hill and Drill Seeder, Double Wheel Hoe, Cultivator and Plow



This combined machine is intended for a class of gardeners who have a large enough acreage in crops for a double wheel hoe to be used to good advantage, and yet prefer not to buy a separate wheel hoe. It is large enough for field use, for it holds two and one-half quarts.

## EQUIPMENT

| I pair 6-inch Hoes | 2 Plows |
| :---: | :---: |
| 2 pair Cultivator Teeth | 2 Leaf Guards |
| Weight, 64 lbs. | Price, $\$ 13.50$ |

## "Planet Jr." No. 16 Single Wheel Hoe, Cultivator, Rake and Plow

This Single Wheel Hoe has a very full set of tools, several of them being of new design, such as have been found to work in the very best manner. It has $I \mathrm{I}$-inch wheel, with broad face; is very light, strong and easy running. It has adjustable handles and quick-change frame.

## EQUIPMENT

26 -inch Hoes
3 Cultivator Teeth

Cultator

I 7-inch-Rake
I 4-inch Rake
Weight, 27 lbs. Price, $\$ 5.85$I large Garden Plow

I large Garden Plow
I Leaf Guard

"Planet Jr." No. 17 Single Wheel Hoe
2 pair 6-inch Hoes
3 Steel Cultivator Teeth
I Leaf Lifter Weight, 22 lbs. Price, \$5
"Planet Jr." No. 18 Single Wheel Hoe
Equipped with Hoes only. Weight, ig lbs. Price, \$3.50
The No. 17 and 18 are like the No. 16, but have fewer attachments.

## "Plant Jr." Twelve-Tooth Harrow Cultivator and Pulverizer

This tool has rapidly grown into favor with farmers, market-gardeners and strawberry-growers. It has a high frame and chisel-shape teeth. The foot-lever pulverizer is a capital addition for preparing ground for the seed drill or for plant setting. Hand levers regulate both width and depth, while in motion; it contracts to 12 inches and expands to 32 inches.
Weight, complete, 73 lbs . Price, $\$ 9$, complete; with lever wheel only, $\$ 7.40$; without wheel or pulverizer, $\$ 6.20$

## FARMOGERM

A preparation of high-bred, nitrogen-gathering bacteria in sealed bottles, ready to use, with water added according to directions. Bottles contain enough Farmogerm to inoculate the seed for one acre. Prepared for the following crops: White Clover Alfalfa Clover Canada Field Peas Red Clover Crimson Clover Alsike Clover Garden Beans Garden Peas Cowpeas Vetches

## Sweet Peas

## Soy Beans

Price per acre bottle, $\$ 2$; per five-acre bottle, \$9. State for what crop Farmogerm is wanted, when ordering.
Also in garden size, enough for $\mathbf{~}, 000$ square feet or a $200-$ foot row, for Peas, Beans, Sweet Peas and White Clover, at 50 cts. per bottle. We secure cultures fresh from the laboratory, hence it takes two or three days to fill orders.


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    154
    Planet Jr. Garden Tools, on page . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 155
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